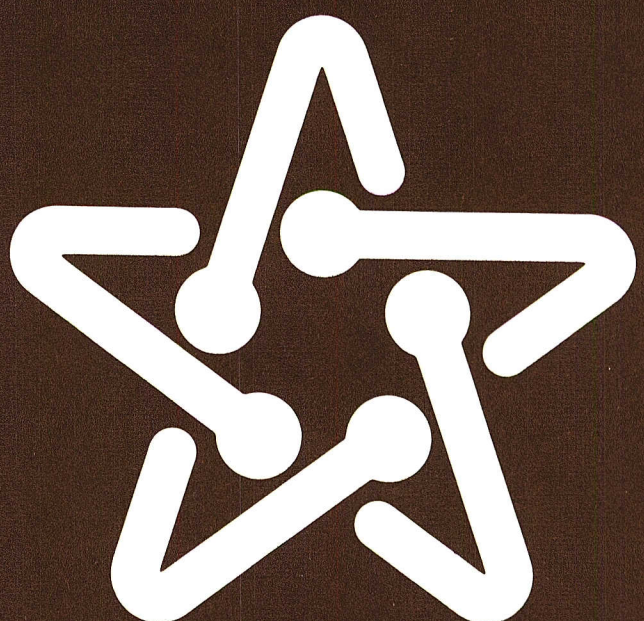
NTISUB/B/127-76/005

Monthly Energy Review

May 1976



Federal Energy Administration

National Energy Information Center

Washington D.C. 20461

Contents

The *Monthly Energy Review* is prepared in the office of Policy and Analysis under the general supervision of John D. Curtis, Office of Energy Systems Data.

Editor: Judy Gaynor
Editorial and Graphics Review: Office of Communications and Public Affairs
Publications Coordinator: Elizabeth A. Snyder

Overview: Judy Gaynor
Crude Petroleum and Products: David A. Carleton, Naomi Kawin
Degree-Days: John H. Roberts
Natural Gas Liquids, Natural Gas: James W. McCarrick
Coal: Patricia Newman
Electric Utilities: Thomas Murphy
Nuclear Power: Andrew W. Reynolds
Consumption: John H. Roberts
Petroleum Consumption Forecast: Chistopher B. Alt
Resource Development: Judy Gaynor
Price: Christopher B. Bordeaux, Les Byers, Brian L. Connor, William Davis, William Gillespie, Annie Whatley
International: Elizabeth Bauer

The cooperation of other government agencies and private establishments which provide much of the data appearing in this publication is gratefully acknowledged.

This periodical is available on a subscription basis from the following:

Subscriptions
National Technical Information Service
5285 Port Royal Road
Springfield, VA 22161

For addresses inside the United States, the cost is $36 per subscription (12 issues). For addresses outside the United States, the cost is $50 per subscription.

Correspondence regarding editorial matters should be addressed to:

Editor, Monthly Energy Review
National Energy Information Center
Federal Energy Administration
Washington, D.C. 20461

Feature Articles appearing in previous issues:

Energy Consumption – March 1975
Nuclear Power – April 1975
The Price of Crude Oil – June 1975
U.S. Coal Resources and Reserves – July 1975
Propane, A National Energy Resource – September 1975
Short-Term Energy Supply and Demand Forecasting at FEA – October 1975
Curtailments of Natural Gas Service – January 1976
Home Heating Conservation Alternatives and the Solar Collector Industry – March 1976

This Administrator has determined that the publication of this periodical is necessary in the transaction of public business required by law of this Agency. Use of funds for printing this periodical have been approved by the Director of the Office of Management and Budget through June 30, 1976.

Part 1 Overview

The United States produced an average of 164 trillion Btu of energy per day (the equivalent of 28.3 million barrels of crude oil per day) during the first quarter of 1976, 1.9 percent less than the production rate for the same period a year earlier. Crude oil output showed the largest decline (4.4 percent) over the 12-month period. Natural gas production fell 3.5 percent. Coal output, in contrast, showed a 1.3-percent increase.

Imports of fossil fuels averaged 45 trillion Btu per day (7.8 million barrels per day of crude oil equivalent) during the first quarter of 1976, 14.4 percent higher than for the same quarter of 1975. An increase of 31.7 percent was posted for crude oil imports, which accounted for 65 percent of total fossil fuels imported during the quarter. Imports of refined products, representing 29 percent of the total, dropped 9.4 percent. Natural gas imports, which comprised the remaining 6 percent, showed no change from levels prevailing a year ago.

Daily consumption of energy in the United States during the first 2 months of 1976 averaged 220 trillion Btu (equal to 38 million barrels of crude oil), an increase of about 1 percent from the corresponding months of 1975. Natural gas consumption declined 6.3 percent, but was counterbalanced by the following consumption increases: refined products, 2.9 percent; coal, 4.7 percent; hydroelectric power, 2.0 percent; and nuclear electric power, 21.2 percent.

Because of continued mild winter weather, the continental United States accumulated 21.5 percent fewer degree-days this March than last March and 14.5 percent fewer than the normal for the month. So far this heating season, national degree-days have averaged 6.8 percent below the previous season and 8.9 percent below normal.

Stocks of all oils exhibited normal seasonal patterns during March: crude oil inventories increased by 10.7 million barrels to 277 million barrels; jet fuel stocks grew by 0.6 million barrels; stocks of distillate and residual fuel oils and motor gasoline declined seasonally by 10.9 million barrels (7.0 percent), 4.0 million barrels (5.6 percent), and 5.2 million barrels (2.1 percent), respectively.

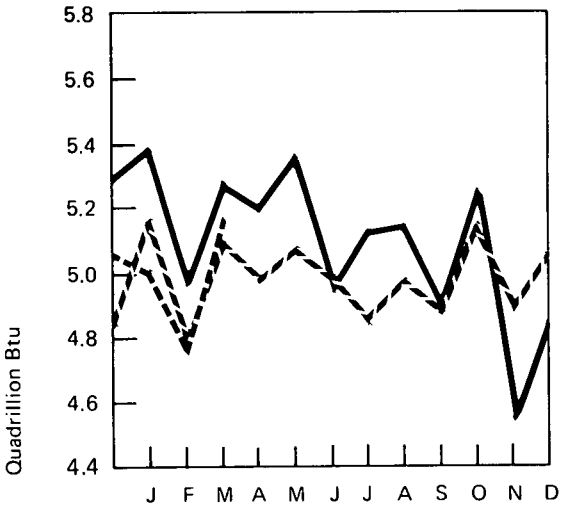
During the first quarter of 1976, utility electricity output was 7.6 percent higher than during the same quarter of 1975. Utility fuel requirements increased correspondingly. During the first 2 months of the year, consumption of coal increased 10.7 percent, oil, 3.4 percent, and natural gas, 2.8 percent.

Retail motor gasoline prices dropped 0.5 cent per gallon during March, the sixth consecutive month of decline. However, the average selling price for regular gasoline at full service stations was 56.6 cents per gallon (including tax), 4.0 cents higher than the price during March 1975.

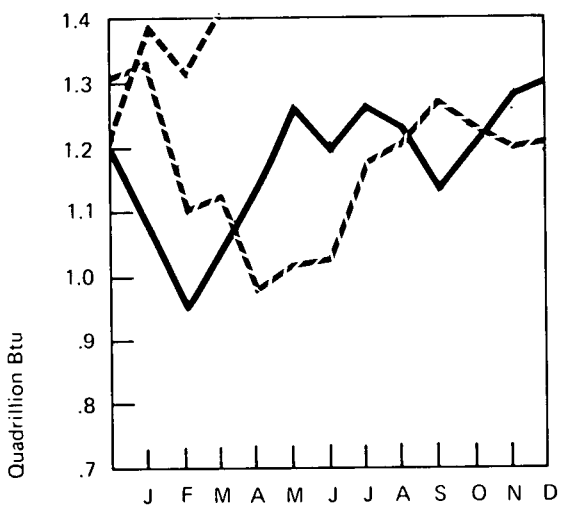
During March, most indicators of resource development activity continued to decline. The number of seismic crews exploring for new oil and gas deposits was 240, a drop of 7 from the previous month, and 62 less than last year's peak of 302 crews which occurred in February. The number of active rotary drilling rigs fell to 1,540, down from 1,651 for the same month in 1975. Well completions, however, continued to run ahead of last year. A total of 3,848 wells were drilled in March, 24.5 percent more than in March 1975.

Worldwide production of crude oil increased 1.3 million barrels per day in March, following a decline of around 0.8 million barrels in February.

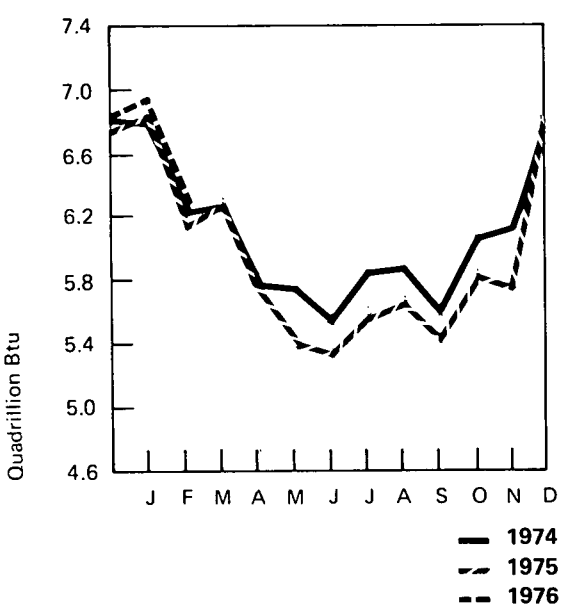
Domestic Production of Energy



Imports of Fossil Fuels



Domestic Consumption of Energy



		Domestic Production of Energy*	Imports of Fossil Fuels**	Domestic Consumption of Energy***
		Quadrillion (10^{15}) Btu		
1973	January	5.367	1.167	7.140
	February	4.937	1.163	6.507
	March	5.370	1.303	6.426
	April	5.112	1.078	5.857
	May	5.311	1.154	5.987
	June	5.070	1.122	5.707
	July	5.084	1.209	5.851
	August	5.382	1.291	6.092
	September	5.035	1.217	5.677
	October	5.300	1.303	6.080
	November	5.138	1.312	6.431
	December	5.276	1.199	6.797
	TOTAL	**62.373**	**14.519**	**74.551**
1974	January	R5.391	R1.072	R6.792
	February	R4.978	0.945	R6.204
	March	R5.293	R1.053	R6.262
	April	R5.198	R1.142	R5.758
	May	R5.373	R1.266	R5.753
	June	R4.944	R1.197	R5.534
	July	R5.140	R1.266	R5.866
	August	R5.155	R1.237	R5.899
	September	R4.999	R1.138	R5.596
	October	R5.263	R1.210	R6.065
	November	R4.540	R1.284	R6.126
	December	R4.845	R1.305	R6.729
	TOTAL	**R61.119**	**R14.114**	**R72.584**
1975	January	R5.179	1.330	R6.819
	February	R4.793	1.093	R6.107
	March	R5.116	1.128	R6.293
	April	R4.982	R0.971	R5.775
	May	R5.098	1.024	R5.373
	June	R4.991	R1.030	R5.329
	July	R4.849	R1.168	R5.575
	August	R4.943	1.214	R5.653
	September	R4.889	R1.273	R5.410
	October	R5.166	1.277	R5.832
	November	R4.883	R1.200	R5.750
	December	R5.063	R1.216	R6.805
	TOTAL	**R59.951**	**R13.874**	**R70.720**
1976	January	R†5.021	R†1.390	R†6.951
	February	R†4.765	R†1.311	†6.272
	March	†5.173	†1.408	
	TOTAL	**14.959** (3 months)	**4.109** (3 months)	**13.223** (2 months)

*See Explanatory Note 1.
**See Explanatory Note 2.
***See Explanatory Note 3.
†Preliminary data.
R=Revised data.

Part 2 Crude Oil and Refined Petroleum Products

CRUDE OIL

Crude oil production, according to an American Petroleum Institute estimate, declined 1.6 percent in March to 8.049 million barrels per day. During the first quarter of 1975, production averaged 8.119 million barrels per day, 4.4 percent less than during the corresponding quarter in 1975.

Crude oil imports increased again during the month to 5.256 million barrels per day. Imports for the first quarter averaged 5.056 million barrels per day, 32 percent higher than in the first quarter of 1975.

Crude oil stocks reached a post-embargo high of 277.2 million barrels, which was equal to 21.5 days of crude oil input to refineries.

Refineries operated at 85.4 percent of capacity during March, compared with the 79.5 percent level of March 1975.

REFINED PETROLEUM PRODUCTS

Domestic demand for refined petroleum products fell seasonally to 17.235 million barrels per day in March. However, March demand established a new record for the month in spite of substantially warmer than normal weather. Increased demand for motor gasoline contributed most to this record. The 6.808 million barrels per day consumed in March was 4.5 percent higher than the previous record established in March 1973. Trends in March motor gasoline demand are shown below in gallons per day consumed per capita:

March 1973 – 1.306
March 1974 – 1.227
March 1975 – 1.250
March 1976 – 1.334

DISTILLATE OIL HEATING DEGREE-DAYS

The number of heating degree-days was abnormally low during March because of continued warm weather. The continental United States accumulated 21.5 percent fewer distillate oil heating degree-days than during March 1975, and 14.9 percent fewer than the normal (1941-70 average) for the month.

From July 1, 1975, through April 4, 1976, the Nation accumulated 6.8 percent fewer degree-days than for the corresponding period a year earlier and 8.9 percent less than normal for this period.

NATURAL GAS LIQUIDS

Domestic demand for natural gas liquids during December was 5.6 percent above the level for the same month in 1974. Demand for the entire year, however, was 4.9 percent below demand in 1974.

Production of natural gas liquids fell 4.1 percent during 1975. December production was unchanged from the December 1974 level.

Imports of natural gas liquids for the year were 12.2 percent below imports during 1974.

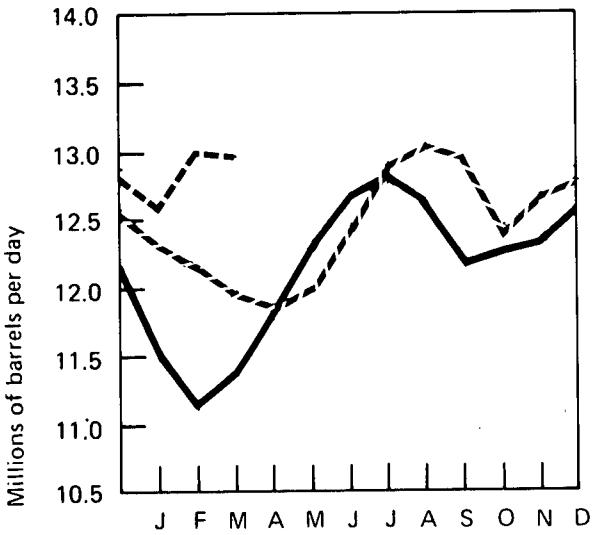
Stocks of natural gas liquids at the end of December were 8.7 percent above December 1974 levels.

Crude Oil

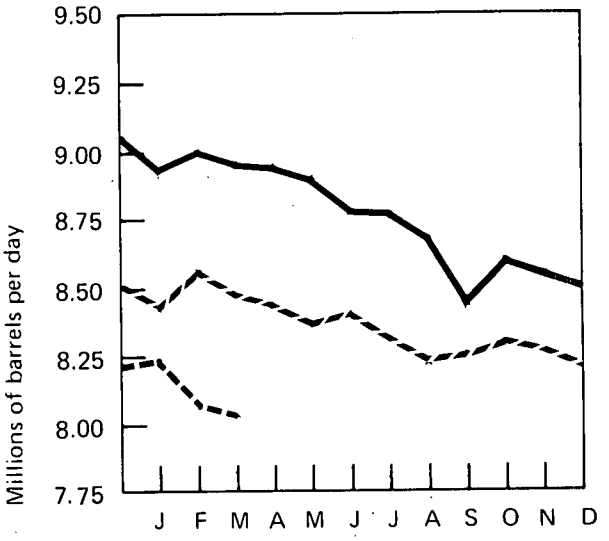
		Crude Input to Refineries		Domestic Production		Imports		Stocks*	
		Thousands of barrels per day						Thousands of barrels	
		BOM	FEA	BOM	API	BOM	FEA	BOM	FEA
1973	January	12,190		9,176		2,732		224,056	
	February	12,187		9,395		2,873		221,893	
	March	12,201		9,272		3,162		230,696	
	April	12,208		9,292		3,049		235,383	
	May	12,281		9,262		3,215		244,777	
	June	12,862		9,214		3,220		235,846	
	July	12,750		9,217		3,501		230,750	
	August	12,635		9,169		3,593		235,660	
	September	12,560		9,065		3,471		228,280	
	October	12,758		9,224		3,739		233,520	
	November	12,374		9,161		3,452		237,001	
	December	12,150		9,063		2,891		229,504	
	AVERAGE	**12,431**		**9,208**		**3,244**			
1974	January	11,491		R8,934		2,382		220,261	
	February	11,102		R9,142		2,248		228,004	
	March	11,355		R8,965		2,462		231,705	
	April	11,823		R8,954		3,267		243,687	
	May	12,333	12,777	R8,911		3,908	3,748	256,726	252,270
	June	12,697	12,709	R8,780		3,925	3,957	255,762	253,008
	July	12,811	12,905	R8,780		4,091	4,167	255,936	252,399
	August	12,644	12,731	R8,699		3,924	3,852	251,905	247,040
	September	12,124	12,253	R8,443		3,797	3,758	253,623	249,476
	October	12,286	12,430	R8,611		3,810	3,936	256,430	255,003
	November	12,332	12,402	8,569		3,958	3,997	258,123	256,271
	December	12,519	12,671	R8,527		3,869	3,979	252,158	248,808
	AVERAGE	**12,133**		**R8,774**		**3,477**			
1975	January	12,297	12,442	8,439		4,029	3,964	258,163	253,836
	February	12,135	12,144	8,575		3,828	4,061	264,348	264,833
	March	11,905	11,961	8,476		3,656	3,853	267,564	271,410
	April	11,803	11,837	8,440		3,378	3,416	269,294	275,393
	May	11,983	11,985	8,371		3,486	3,493	263,336	274,123
	June	12,417	12,421	8,409		3,905	3,907	262,873	268,564
	July	12,915	13,002	8,327		4,193	4,337	252,035	256,965
	August	13,046	13,120	8,237		4,581	4,661	244,325	250,354
	September	12,945	12,939	8,266		4,689	4,664	247,328	253,597
	October	12,365	12,463	8,310	8,324	4,389	4,416	257,799	260,887
	November	12,689	12,766	8,271	8,273	4,623	4,634	258,666	261,869
	December	12,779	**12,877	8,239	8,224	4,476	**4,496	259,371	**264,638
	AVERAGE	***R12,442		**R8,362**		**R4,105**			
1976	January		12,598		8,242		4,947		275,583
	February		13,011		8,062		R4,958		266,477
	March		12,908		8,049		5,256		277,220
	AVERAGE (3 months)		**12,835**		**8,119**		**5,056**		

*See definitions.
**Preliminary data.
***1975 average for refinery input, imports, and stocks is based on Bureau of Mines (BOM) data.
R=Revised data.
Sources: BOM, FEA, and API as indicated. All 1976 data are from API.

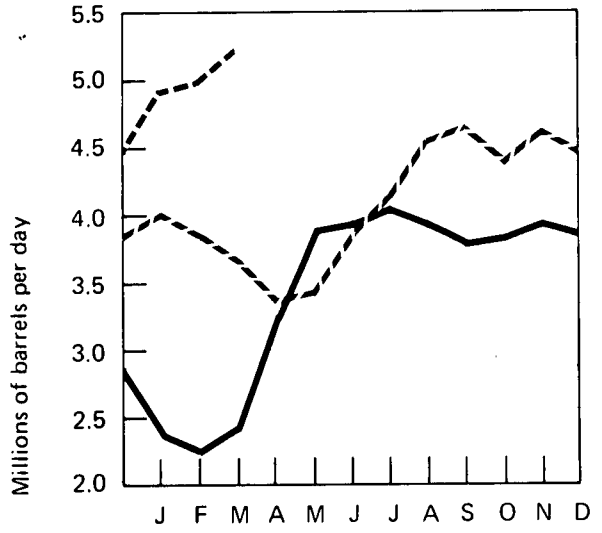
Crude Input to Refineries*



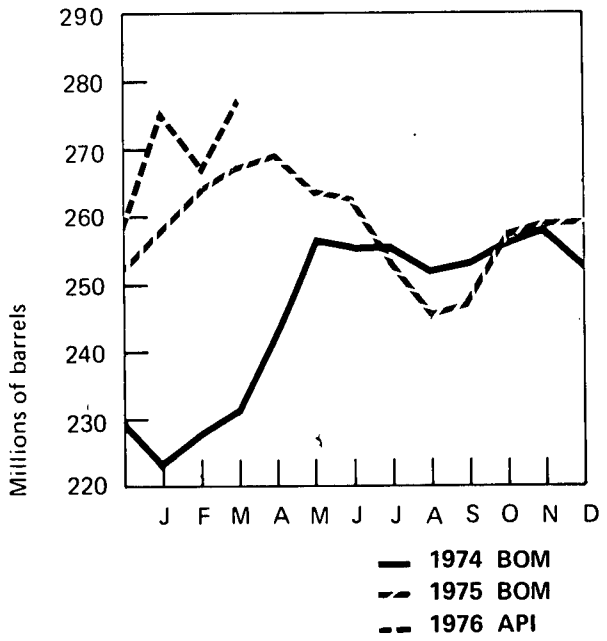
Domestic Production*



Imports*



Stocks*



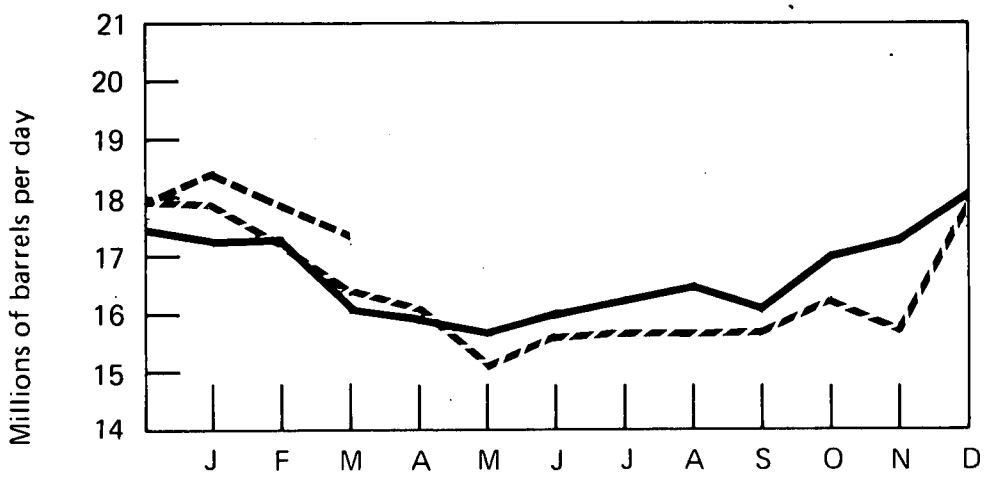
*See Explanatory Note 4.

Total Refined Petroleum Products

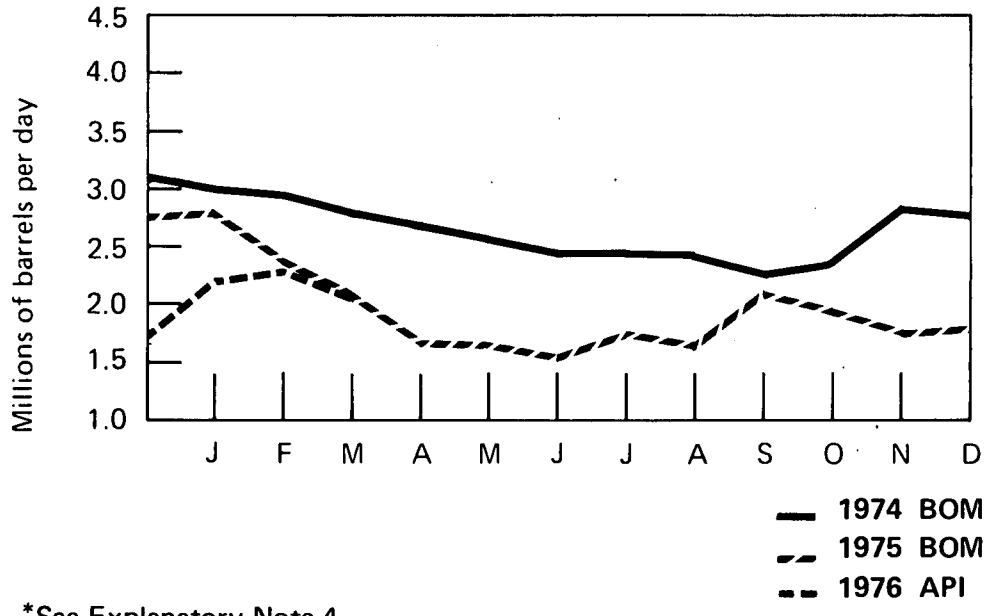
		Domestic Demand		Imports*	
		Thousands of barrels per day			
		BOM	FEA	BOM	FEA
1973	January	18,713		3,125	
	February	19,094		3,635	
	March	17,216		3,448	
	April	15,921		2,545	
	May	16,626		2,626	
	June	16,481		2,670	
	July	16,372		2,678	
	August	17,499		2,999	
	September	16,656		2,941	
	October	17,202		2,894	
	November	18,492		3,470	
	December	17,538		3,164	
	AVERAGE	**17,308**		**3,012**	
1974	January	R17,286		R2,989	
	February	R17,366		R2,968	
	March	R16,104		R2,812	
	April	R15,929		R2,713	
	May	R15,726	15,740	R2,586	2,454
	June	R16,117	16,191	R2,435	2,218
	July	R16,349	15,853	R2,445	2,140
	August	R16,550	15,803	R2,438	2,281
	September	R16,024	16,318	R2,255	2,180
	October	R17,050	17,121	R2,366	2,361
	November	R17,351	17,129	R2,840	2,581
	December	R18,013	17,588	R2,798	2,638
	AVERAGE	**R16,653**		**R2,635**	
1975	January	17,983	18,112	2,811	2,484
	February	17,248	17,370	2,348	2,138
	March	16,316	16,567	2,074	1,920
	April	16,041	16,105	1,655	1,810
	May	15,118	15,306	1,690	1,776
	June	15,611	15,688	1,502	1,602
	July	15,762	15,880	1,789	1,875
	August	15,767	16,241	1,681	1,870
	September	15,769	15,798	2,116	2,144
	October	16,344	15,830	1,907	1,696
	November	15,721	15,878	1,739	1,605
	December	17,987	**17,648	1,751	**1,678
	AVERAGE*	**R16,291**		**R1,888**	
1976	January		18,472		2,235
	February		R17,796		R2,295
	March		17,325		2,035
	AVERAGE (3 months)		**17,866**		**2,186**

*See definitions.
**Preliminary data.
***1975 average is based on Bureau of Mines (BOM) data.
R=Revised data.
Sources: BOM and FEA as indicated. All 1976 data are from API.

Domestic Demand *



Imports *



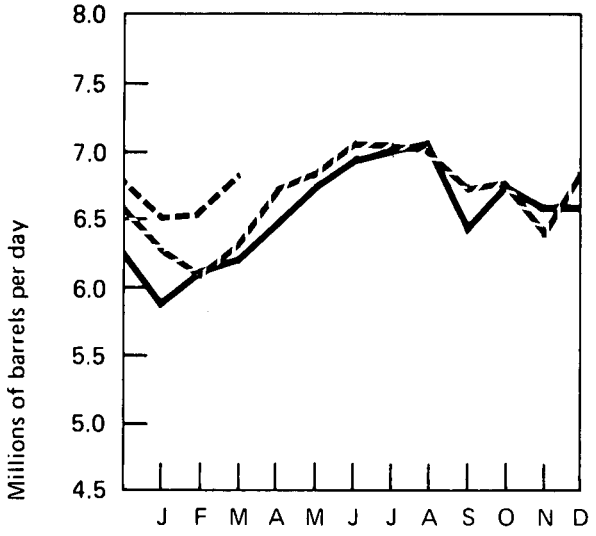
*See Explanatory Note 4.

Motor Gasoline

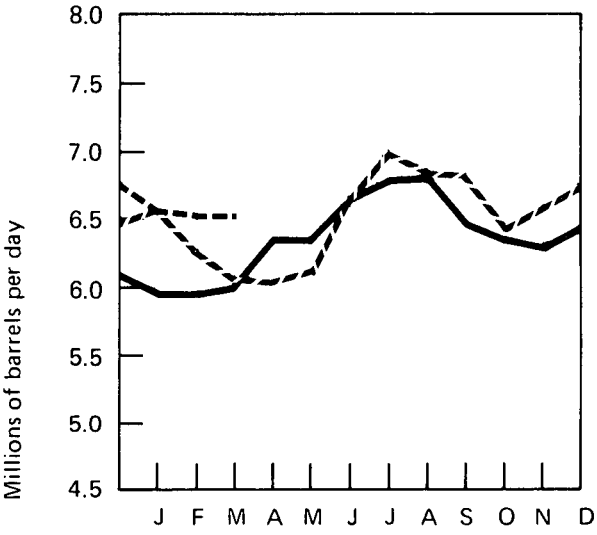
		Domestic Demand		Production*		Imports		Stocks*	
		Thousands of barrels per day						Thousands of barrels	
		BOM	FEA	BOM	FEA	BOM	FEA	BOM	FEA
1973	January	6,118		6,341		59		221,823	
	February	6,437		6,855		95		216,367	
	March	6,513		6,150		71		207,581	
	April	6,541		6,377		63		204,708	
	May	6,907		6,714		101		202,081	
	June	6,964		6,993		174		208,374	
	July	7,023		6,986		133		211,488	
	August	7,257		6,880		164		205,122	
	September	6,581		6,619		127		210,278	
	October	6,677		6,621		194		214,525	
	November	6,823		6,375		216		207,343	
	December	6,237		6,099		202		209,395	
	AVERAGE	**6,674**		**6,527**		**134**			
1974	January	5,804		5,900		163		217,463	
	February	6,100		5,969		184		219,058	
	March	6,162		5,982		225		220,307	
	April	6,457		6,311		260		223,752	
	May	6,745	6,406	R6,329	6,301	250	228	218,670	229,878
	June	6,919	6,895	6,663	6,642	211	145	217,381	226,652
	July	6,959	6,941	R6,793	6,835	212	122	218,838	227,195
	August	7,061	6,849	6,815	6,776	253	192	218,951	231,015
	September	6,388	6,652	6,453	6,485	202	140	227,031	230,181
	October	6,712	6,542	6,336	6,340	171	175	220,748	229,275
	November	6,547	6,659	6,292	6,257	174	264	218,385	225,226
	December	6,558	6,551	6,419	6,451	141	170	224,719	227,363
	AVERAGE	**6,537**		**6,358**		**204**			
1975	January	6,206	6,228	6,509	6,574	262	203	242,285	244,425
	February	6,096	6,205	6,276	6,279	171	168	251,915	251,189
	March	6,326	6,408	6,070	6,068	150	146	248,685	245,181
	April	6,718	6,574	6,046	5,997	133	127	232,556	231,542
	May	6,871	6,855	6,126	6,063	142	135	213,947	211,183
	June	7,076	6,951	6,669	6,622	177	156	207,114	205,713
	July	7,041	6,957	7,003	6,992	209	167	212,454	211,942
	August	7,008	7,103	6,872	6,843	232	275	215,480	212,370
	September	6,729	6,740	6,822	6,782	269	246	226,447	221,020
	October	6,778	6,593	6,409	6,396	207	178	221,493	220,390
	November	6,389	6,422	6,602	6,595	139	129	232,091	229,417
	December	6,808	**6,760	6,786	**6,777	119	**107	234,925	**233,248
	AVERAGE***	**R6,674**		**R6,518**		**R184**			
1976	January		6,488		6,530		129		239,935
	February		6,515		6,501		138		243,527
	March		6,808		6,502		139		238,302
	AVERAGE (3 months)		**6,606**		**6,511**		**135**		

*See definitions.
**Preliminary data.
***1975 average is based on Bureau of Mines (BOM) data.
R=Revised data.
Sources: BOM and FEA as indicated. All 1976 data are from API.

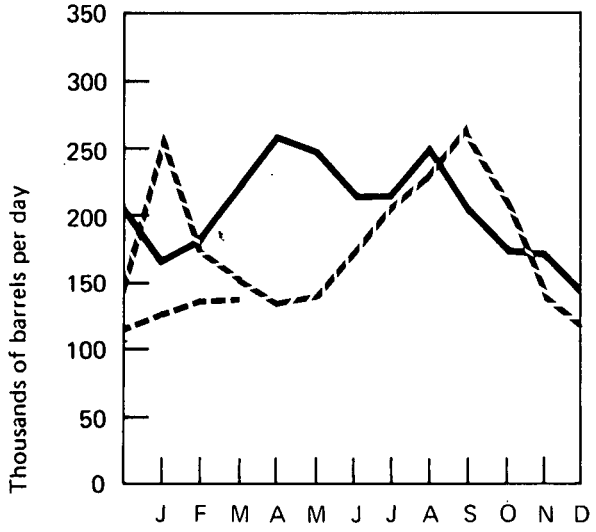
Domestic Demand*



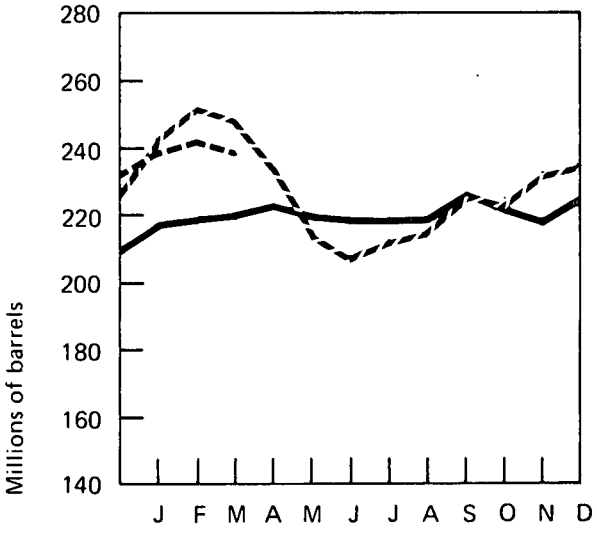
Production*



Imports*



Stocks*



1974 BOM
1975 BOM
1976 API

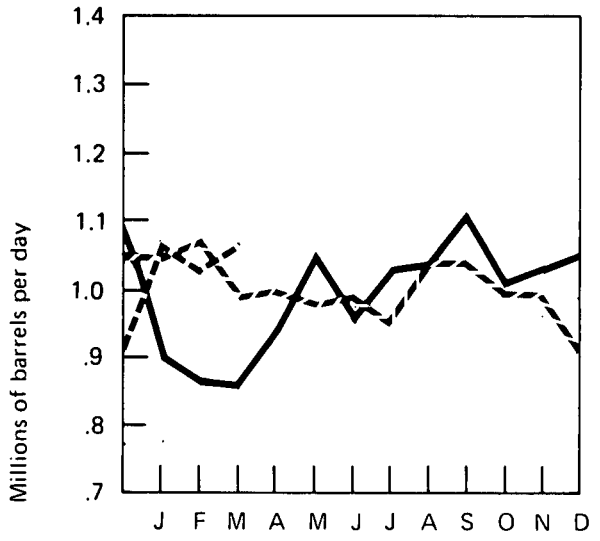
*See Explanatory Note 4.

Jet Fuel

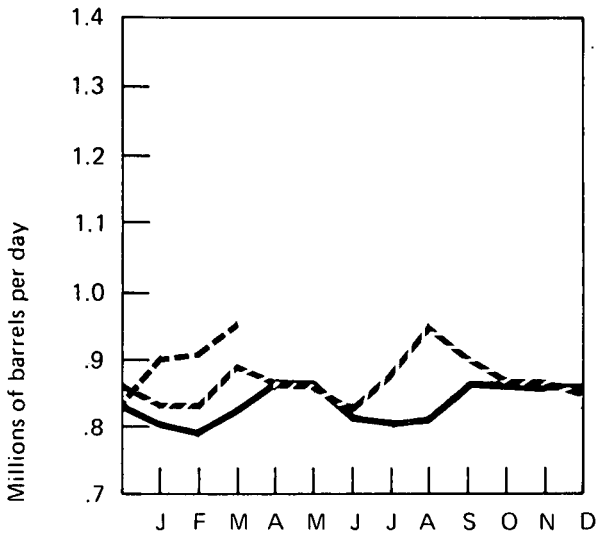
		Domestic Demand		Production		Imports		Stocks	
		Thousands of barrels per day						Thousands of barrels	
		BOM	FEA	BOM	FEA	BOM	FEA	BOM	FEA
1973	January	1,110		864		231		24,814	
	February	1,090		898		221		25,437	
	March	994		917		152		27,585	
	April	1,015		887		145		27,881	
	May	1,112		840		211		25,825	
	June	1,007		836		164		25,447	
	July	1,046		825		232		25,661	
	August	1,049		844		180		24,851	
	September	1,070		847		235		25,149	
	October	1,104		875		246		25,577	
	November	1,025		852		275		28,539	
	December	1,087		830		259		28,544	
	AVERAGE	**1,059**		**859**		**212**			
1974	January	895		800		136		29,732	
	February	860		783		75		29,617	
	March	956		832		139		29,996	
	April	941		868		132		31,725	
	May	1,053	915	868	873	205	97	32,324	33,574
	June	952	1,016	810	886	141	115	32,200	33,128
	July	1,028	1,032	802	813	214	188	31,671	32,231
	August	1,031	1,076	805	849	206	202	30,989	31,594
	September	1,109	1,100	867	883	217	183	30,186	30,587
	October	1,011	1,092	868	905	161	216	30,564	31,488
	November	1,032	1,055	863	861	140	222	29,616	31,303
	December	1,043	1,138	861	908	178	219	29,776	30,957
	AVERAGE	**993**		**836**		**163**			
1975	January	1,041	1,001	831	847	229	164	30,321	31,221
	February	1,075	1,032	835	849	200	167	29,133	30,641
	March	982	1,018	896	892	130	136	30,456	30,906
	April	1,006	1,034	864	863	138	212	30,263	32,083
	May	977	996	861	857	133	124	30,719	31,587
	June	989	996	839	837	106	112	29,337	30,122
	July	954	984	883	880	88	106	29,798	30,167
	August	1,046	1,032	958	955	132	108	31,103	31,105
	September	1,040	950	907	901	140	116	31,291	33,053
	October	997	945	863	814	106	65	30,410	30,978
	November	999	960	864	860	89	57	28,977	29,634
	December	911	*778	849	*832	109	*69	30,380	*33,395
	AVERAGE**	**R1,001**		**R871**		**R133**			
1976	January		1,076		906		124		29,001
	February		1,022		912		120		29,237
	March		1,069		959		128		29,791
	AVERAGE (3 months)		**1,056**		**926**		**124**		

*Preliminary data.
**1975 average is based on Bureau of Mines (BOM) data.
R=Revised data.
Sources: BOM and FEA as indicated. All 1976 data are from API.

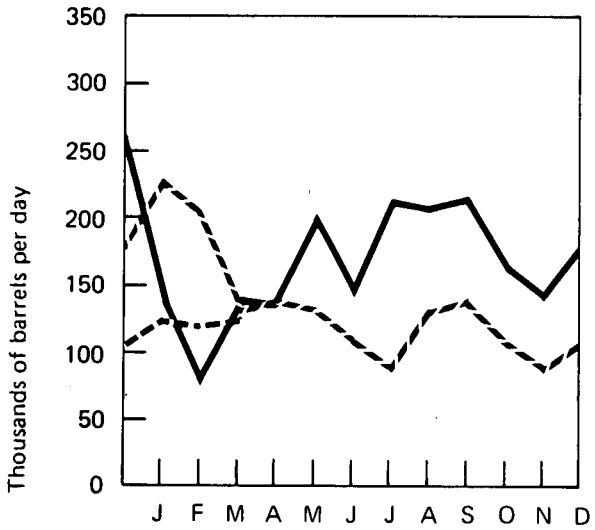
Domestic Demand*



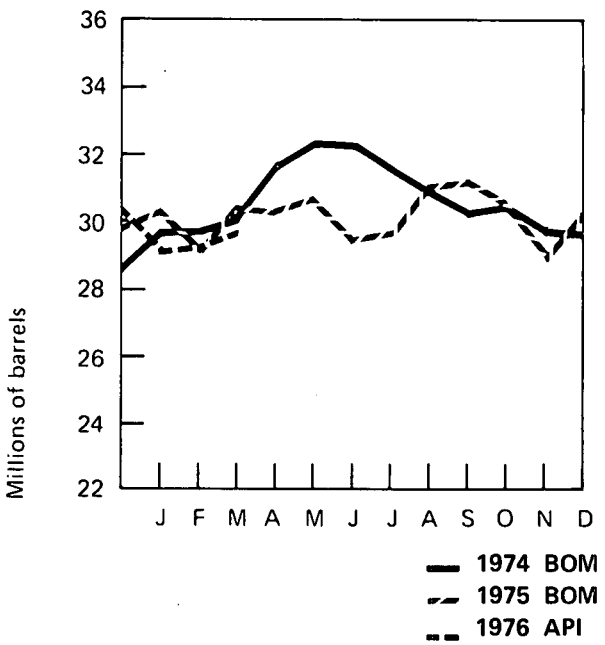
Production*



Imports*



Stocks*



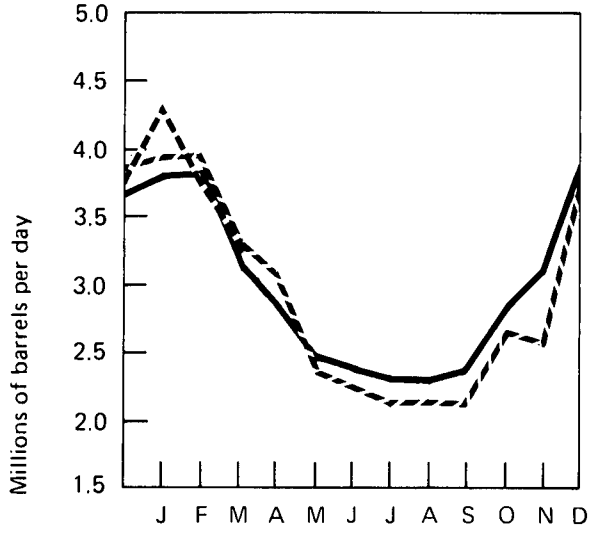
*See Explanatory Note 4.

Distillate Fuel Oil

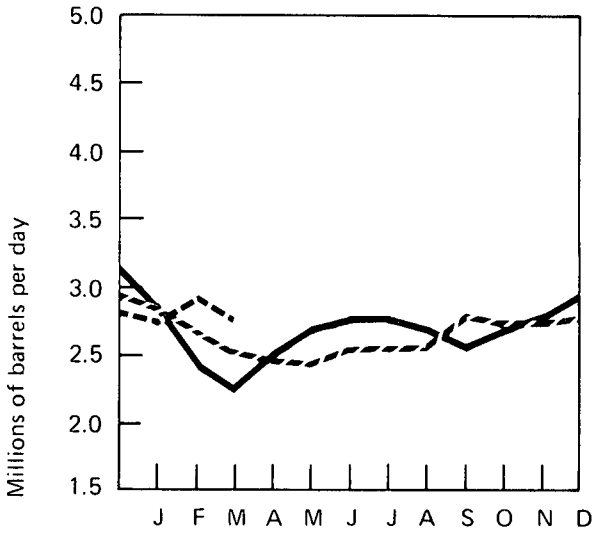
		Domestic Demand		Production*		Imports		Stocks*	
		Thousands of barrels per day						Thousands of barrels	
		BOM	FEA	BOM	FEA	BOM	FEA	BOM	FEA
1973	January	4,138		3,028		364		130,958	
	February	4,302		2,937		731		113,276	
	March	3,337		2,667		602		111,270	
	April	2,635		2,510		240		114,698	
	May	2,673		2,544		268		119,104	
	June	2,419		2,825		222		137,844	
	July	2,328		2,752		318		160,869	
	August	2,555		2,801		288		177,271	
	September	2,675		2,813		313		190,171	
	October	2,930		2,911		451		202,965	
	November	3,508		2,922		492		200,182	
	December	3,690		3,136		439		196,421	
	AVERAGE	**3,092**		**2,820**		**392**			
1974	January	R3,835		2,880		R464		181,179	
	February	R3,849		2,399		R306		149,125	
	March	R3,164		2,226		R287		128,822	
	April	R2,852		2,522		R220		125,553	
	May	R2,450	2,616	2,704	2,741	R268	288	141,806	151,345
	June	R2,377	2,249	2,783	2,818	R220	175	160,645	173,639
	July	R2,309	2,251	2,792	2,881	R221	168	182,458	198,374
	August	R2,309	2,271	R2,705	2,779	R125	112	198,673	217,632
	September	R2,385	2,473	R2,552	2,655	R152	143	208,269	227,069
	October	R2,887	2,816	R2,700	2,787	R237	264	209,908	234,257
	November	R3,157	3,058	2,801	2,883	R454	403	212,875	241,125
	December	R3,853	3,923	2,924	3,028	R515	466	223,717	227,877
	AVERAGE	**R2,948**		**2,668**		**R289**			
1975	January	3,953	4,055	2,852	2,954	324	350	199,715	204,576
	February	3,967	4,004	2,679	2,707	302	295	176,696	176,530
	March	3,293	3,460	2,531	2,614	256	217	161,111	156,980
	April	3,094	3,103	2,486	2,532	110	131	146,214	143,714
	May	2,382	2,435	2,431	2,496	136	144	152,027	150,068
	June	2,266	2,272	2,574	2,639	68	74	163,306	163,252
	July	2,112	2,147	2,589	2,659	106	124	181,472	182,975
	August	2,173	2,237	2,592	2,650	92	91	197,323	198,539
	September	2,163	2,184	2,812	2,844	129	111	220,732	221,659
	October	2,675	2,631	2,744	2,778	103	106	226,113	229,439
	November	2,544	2,643	2,767	2,853	96	94	235,749	238,562
	December	3,778	**3,932	2,783	**2,893	124	**151	208,787	**210,976
	AVERAGE*	**R2,849**		**R2,653**		**R153**			
1976	January		4,320		2,725		264		171,609
	February		R3,706		2,927		R203		154,912
	March		3,244		2,753		139		144,019
	AVERAGE (3 months)		**3,758**		**2,799**		**202**		

*See definitions.
**Preliminary data.
***1975 average is based on Bureau of Mines (BOM) data.
R=Revised data.
Sources: BOM and FEA as indicated. All 1976 data are from API.

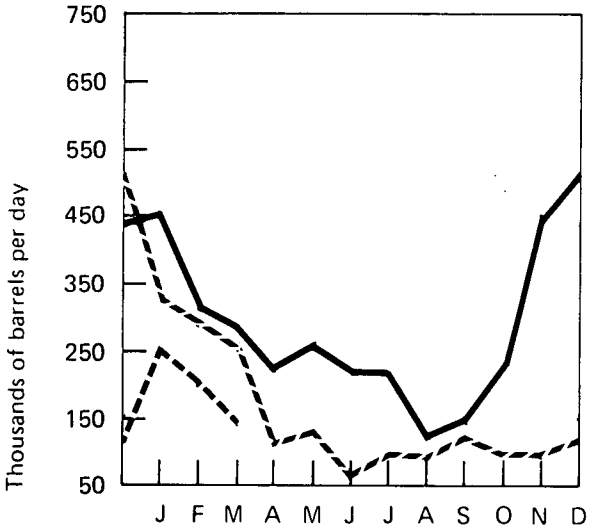
Domestic Demand*



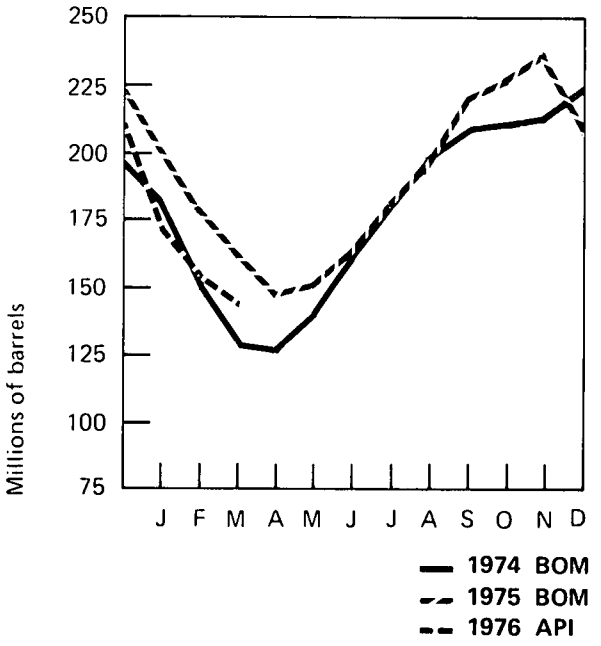
Production*



Imports*



Stocks*



*See Explanatory Note 4.

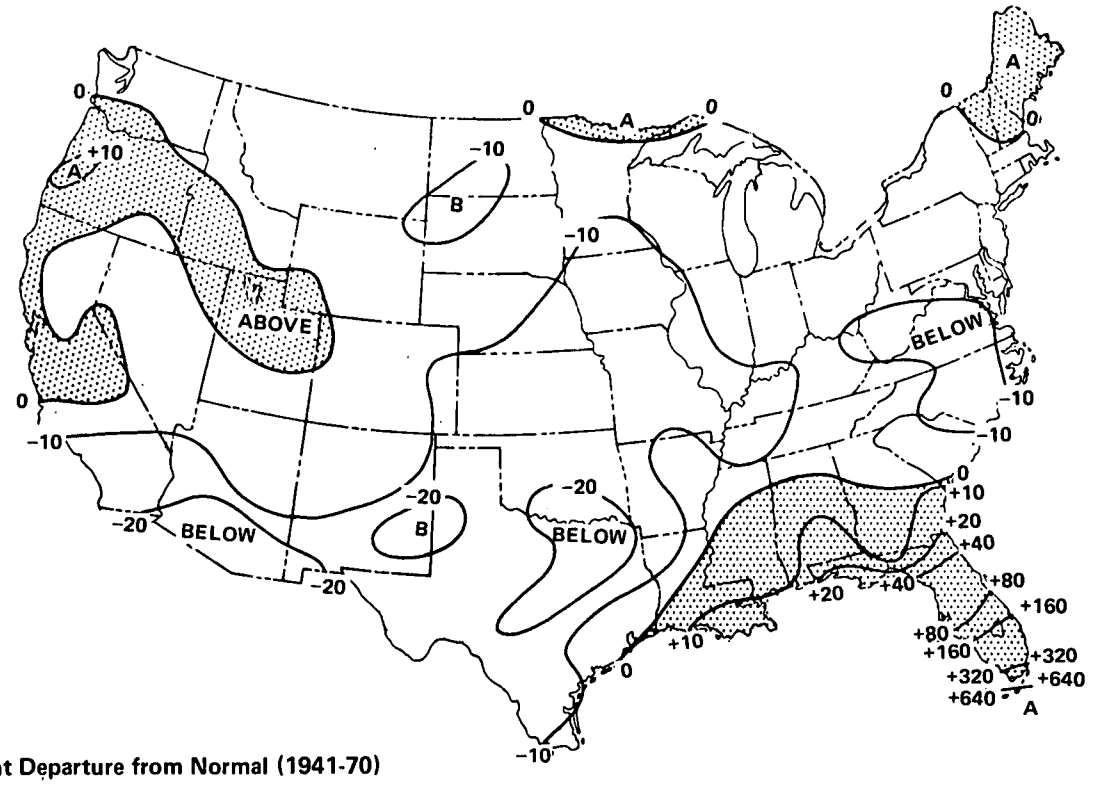
Oil Heating Degree-Days

Petroleum Administration for Defense (PAD) Districts	MARCH (March 1 - April 4) 1976	1975**	Normal (1941-70)**	Cumulative Since July 1 1975-76	1974-75**	Normal (1941-70)**
PAD District I	595.5	767.2 (-22.4)	731.4 (-18.6)	3,848.2	4,056.6 (-5.1)	4,234.4 (-9.1)
New England Conn., Maine, Mass. N.H., R.I., Vt.	995.4	1,128.1 (-11.8)	1,075.0 (-7.4)	5,977.5	6,063.5 (-1.4)	6,102.4 (-2.0)
Middle Atlantic Del., Md., N.J., N.Y., Pa.	656.5	843.9 (-22.2)	809.1 (-18.9)	3,983.6	4,267.8 (-6.7)	4,537.6 (-12.2)
Lower Atlantic Fla., Ga., N.C., S.C., Va., W. Va.	291.2	469.3 (-38.0)	442.6 (-34.2)	2,431.4	2,631.2 (-7.6)	2,792.8 (-12.9)
PAD District II Ill., Ind., Iowa, Kans., Ky., Mich., Minn., Mo., Nebr., N. Dak., Ohio, Okla., S. Dak., Tenn., Wisc.	777.9	1,076.0 (-27.7)	945.6 (-17.7)	5,066.7	5,598.6 (-9.5)	5,608.2 (-9.7)
PAD District III Ala., Ark., La., Miss., N. Mex., Tex.	274.0	424.1 (-35.4)	399.1 (-31.3)	2,357.6	2,421.7 (-2.6)	2,640.8 (-10.7)
PAD District IV Colo., Idaho, Mont., Utah, Wyo.	944.8	891.3 (6.0)	895.2 (5.5)	5,300.6	5,226.8 (1.4)	5,458.1 (-2.9)
PAD District V Arizo., Calif., New., Oreg., Wash.	308.4	369.3 (-16.5)	333.5 (-7.5)	1,838.6	2,150.8 (-14.5)	2,140.6 (-14.1)
U.S. TOTAL	**754.6**	**961.3 (-21.5)**	**886.4 (-14.9)**	**4,803.1**	**5,152.6 (-6.8)**	**5,273.7 (-8.9)**

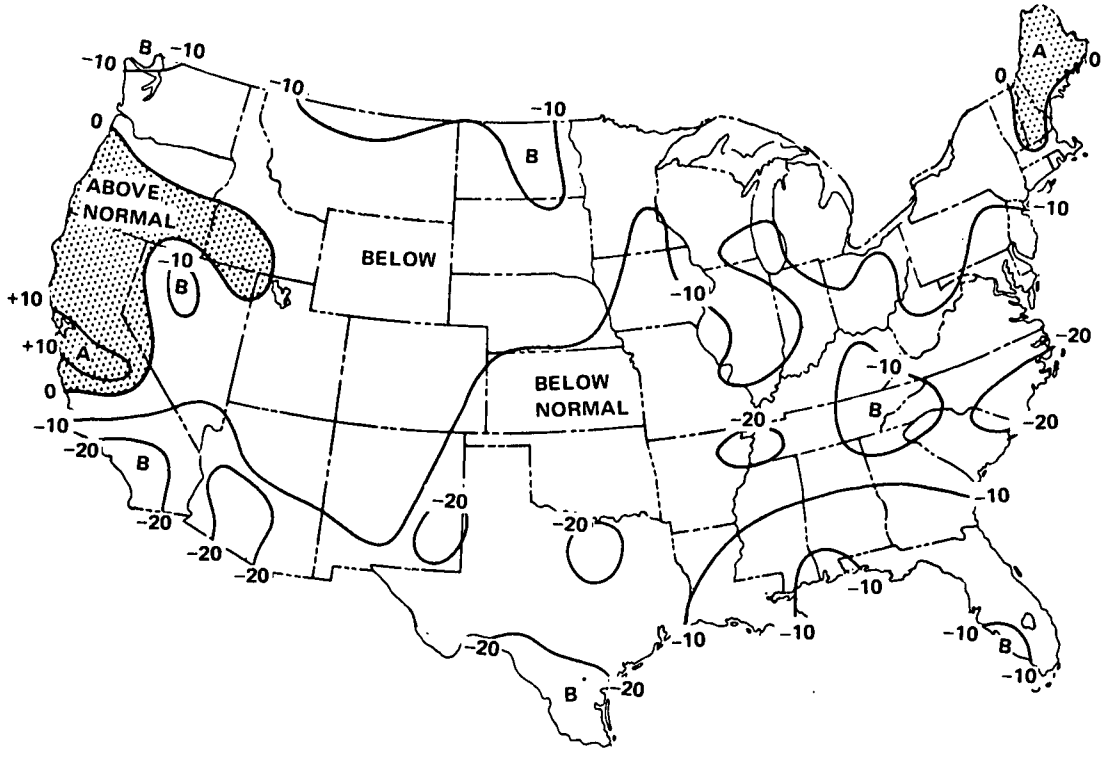
*See Explanatory Note 5 for explanation of oil heating degree-days.
**Percentage change in parenthesis.

Heating Degree-Days Accumulated from July 1, 1975, through April 4, 1976

Percent Departure from 1974-75



Percent Departure from Normal (1941-70)



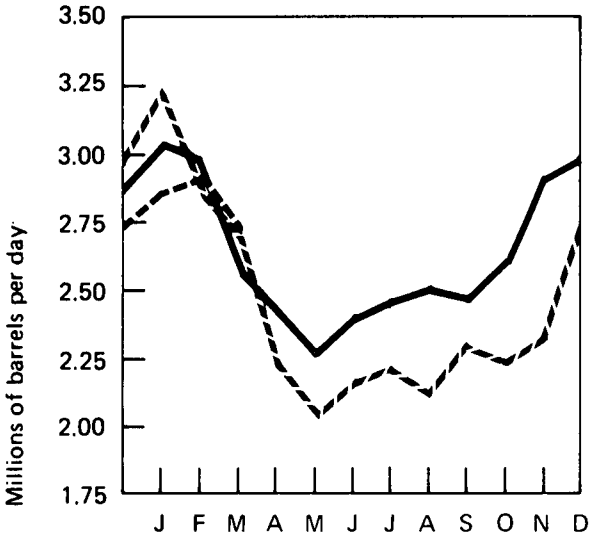
Note: Above normal heating degree-days correspond to below normal temperatures.
Source: Department of Commerce—NOAA.

Residual Fuel Oil

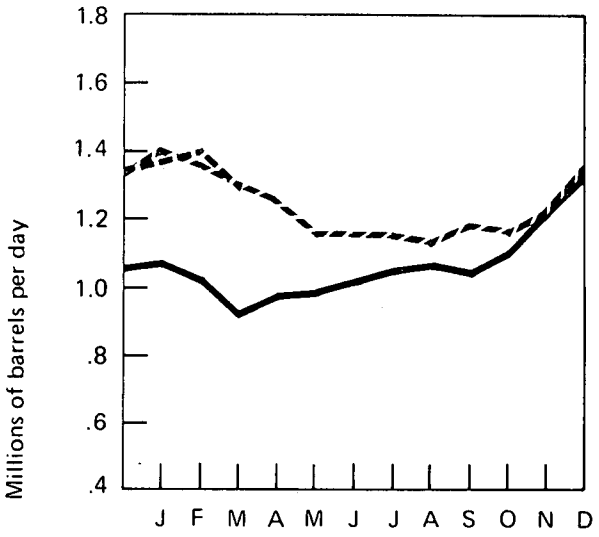
		Domestic Demand		Production		Imports		Stocks	
		Thousands of barrels per day						Thousands of barrels	
		BOM	FEA	BOM	FEA	BOM	FEA	BOM	FEA
1973	January	3,306		1,112		2,019		49,154	
	February	3,382		1,038		2,147		43,058	
	March	3,084		955		2,196		44,711	
	April	2,477		877		1,705		47,044	
	May	2,521		948		1,668		49,207	
	June	2,607		915		1,761		51,811	
	July	2,412		882		1,597		53,363	
	August	2,755		851		1,913		53,586	
	September	2,676		878		1,849		55,091	
	October	2,590		984		1,597		54,964	
	November	3,158		1,061		1,979		51,985	
	December	2,944		1,158		1,826		53,480	
	AVERAGE	**2,822**		**971**		**1,853**			
1974	January	3,035		1,072		R1,733		46,548	
	February	R2,991		1,029		R1,904		45,004	
	March	R2,556		912		R1,713		47,222	
	April	R2,437		R985		R1,593		51,339	
	May	R2,260	2,111	995	992	R1,362	1,250	54,356	64,548
	June	R2,405	2,177	1,026	1,058	R1,500	1,260	57,891	68,646
	July	R2,473	2,135	1,056	1,091	R1,474	1,197	59,787	73,066
	August	R2,529	2,368	1,067	1,126	R1,520	1,342	60,988	76,011
	September	R2,475	2,419	1,032	1,070	R1,421	1,274	60,251	72,723
	October	R2,611	2,501	1,099	1,112	R1,465	1,369	58,679	72,090
	November	R2,935	2,631	1,229	1,226	R1,753	1,453	60,363	73,581
	December	R2,983	2,881	1,335	1,350	R1,630	1,561	74,939	74,521
	AVERAGE	**R2,639**		**1,070**		**R1,587**			
1975	January	3,242	3,103	1,415	1,399	1,647	1,529	60,233	68,628
	February	2,849	2,723	1,354	1,304	1,402	1,308	66,495	65,061
	March	2,668	2,589	1,299	1,244	1,292	1,252	64,148	61,891
	April	2,225	2,184	1,245	1,204	1,047	1,069	66,340	64,121
	May	2,049	1,909	1,151	1,113	1,123	1,068	73,498	72,088
	June	2,179	2,201	1,152	1,118	904	953	69,660	67,641
	July	2,239	2,141	1,155	1,160	1,144	1,110	71,526	71,358
	August	2,118	2,217	1,146	1,151	982	1,044	71,857	70,489
	September	2,329	2,388	1,183	1,178	1,312	1,319	76,938	73,471
	October	2,238	2,025	1,165	1,142	1,221	1,153	81,858	81,192
	November	2,349	2,412	1,214	1,231	1,169	1,154	83,131	79,908
	December	2,728	*2,683	1,354	*1,340	1,099	*1,159	74,126	*73,805
	AVERAGE**	**R2,433**		**R1,235**		**R1,194**			
1976	January		2,865		1,373		1,373		70,650
	February		2,913		1,411		1,524		70,767
	March		2,716		1,296		1,299		66,816
	AVERAGE (3 months)		**2,830**		**1,359**		**1,396**		

*Preliminary data.
**1975 average is based on Bureau of Mines (BOM) data.
R=Revised data.
Sources: BOM and FEA as indicated. All 1976 data are from API.

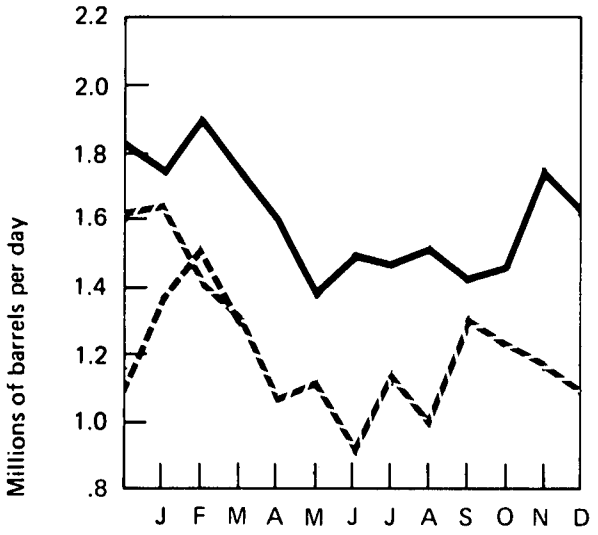
Domestic Demand*



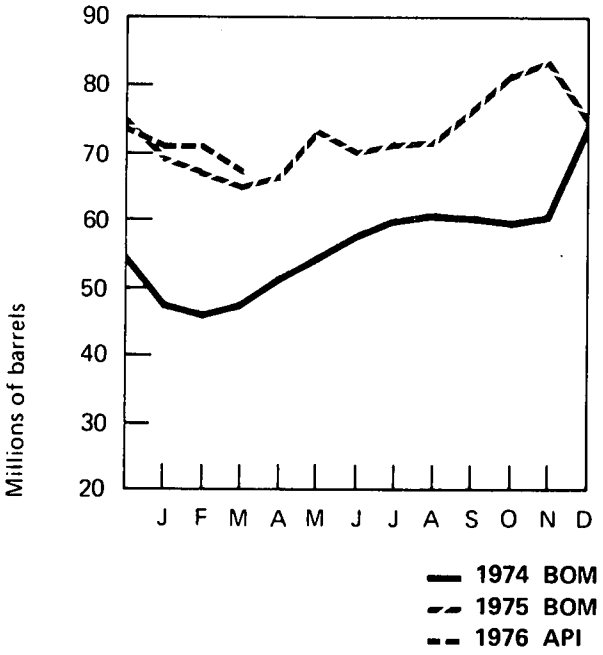
Production*



Imports*



Stocks*



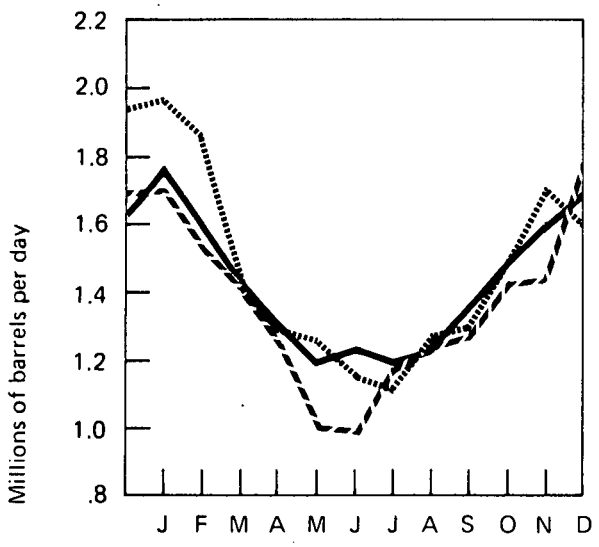
*See Explanatory Note 4.

Natural Gas Liquids

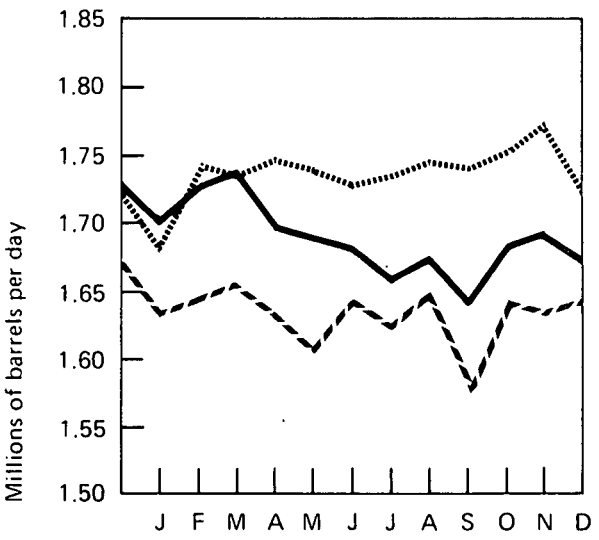
		Domestic Demand*	Production*		Used at Refineries*	Imports	Stocks*
			At processing plants	At refineries			Thousands of barrels
		Thousands of barrels per day					
1973	January	1,994	1,680	361	839	312	68,792
	February	1,857	1,745	359	836	312	60,606
	March	1,407	1,734	378	790	260	63,873
	April	1,299	1,750	373	733	201	71,266
	May	1,270	1,739	421	733	217	80,650
	June	1,149	1,727	388	757	163	89,433
	July	1,109	1,737	410	849	199	99,631
	August	1,281	1,748	390	858	240	105,068
	September	1,297	1,741	370	833	206	110,002
	October	1,499	1,756	377	835	249	109,639
	November	1,703	1,774	331	876	286	104,192
	December	1,607	1,729	338	842	232	98,940
	AVERAGE	**1,454**	**1,738**	**375**	**815**	**239**	
1974	January	1,778	1,699	327	794	304	91,210
	February	1,593	1,728	337	777	294	90,145
	March	1,408	1,741	341	720	224	94,817
	April	1,321	1,696	353	690	215	101,352
	May	1,180	1,690	340	678	182	110,881
	June	1,242	1,684	368	718	199	117,915
	July	1,187	1,657	364	723	163	125,427
	August	1,221	1,676	361	742	163	131,675
	September	1,360	1,638	348	738	166	133,215
	October	1,493	1,686	330	788	200	130,557
	November	R1,604	1,694	301	795	R208	124,447
	December	1,692	1,670	286	796	230	114,295
	AVERAGE	**1,422**	**1,688**	**338**	**746**	**R212**	
1975	January	1,708	1,630	307	756	257	105,400
	February	1,512	1,646	296	734	181	100,945
	March	1,404	1,658	280	731	178	99,168
	April	1,242	1,635	273	667	176	100,408
	May	1,002	1,607	299	628	97	112,737
	June	998	1,646	323	659	166	125,215
	July	1,191	1,621	336	701	173	131,359
	August	1,227	1,650	357	690	163	137,074
	September	1,278	1,577	326	703	209	140,278
	October	1,429	1,643	310	729	198	138,981
	November	1,444	1,635	309	759	196	135,976
	December	1,787	1,646	310	768	232	124,278
	AVERAGE	**1,352**	**1,633**	**311**	**710**	**186**	

*See Explanatory Note 6.
Source: Bureau of Mines.

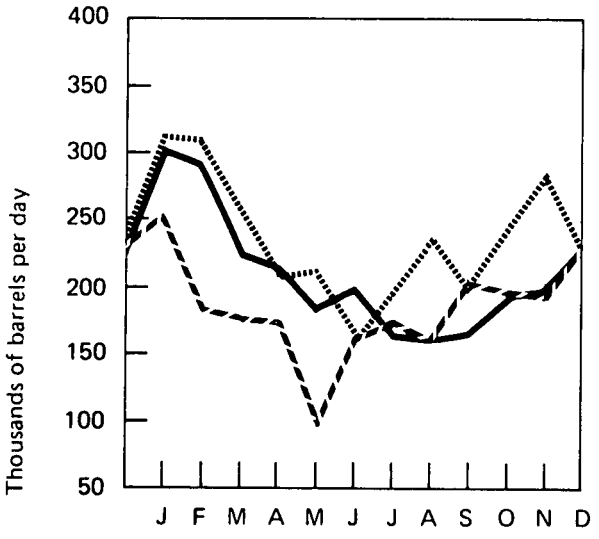
Domestic Demand



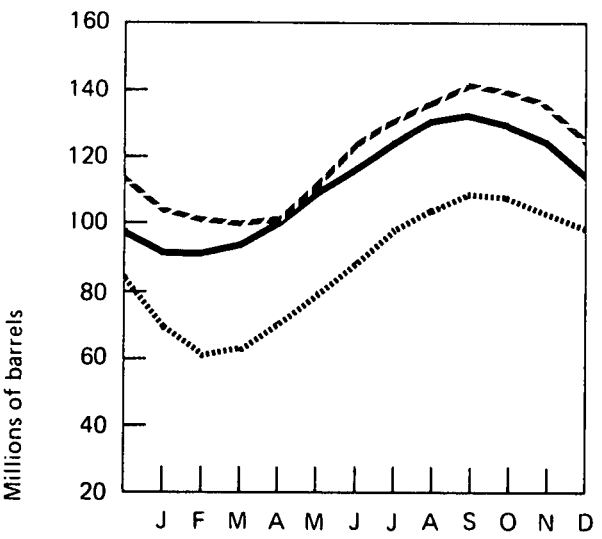
Production at Processing Plants



Imports



Stocks



1973
1974
1975

Part 3 Natural Gas

NATURAL GAS

Marketed production of natural gas in March was projected to be 2.5 percent below the volume marketed during March 1975. Domestic consumption was estimated to be down 4.9 percent, and imports down 1.2 percent from March 1975 levels.

Domestic producer sales to major interstate pipeline companies during January totaled 894 billion cubic feet, 5.9 percent below sales for January 1975.

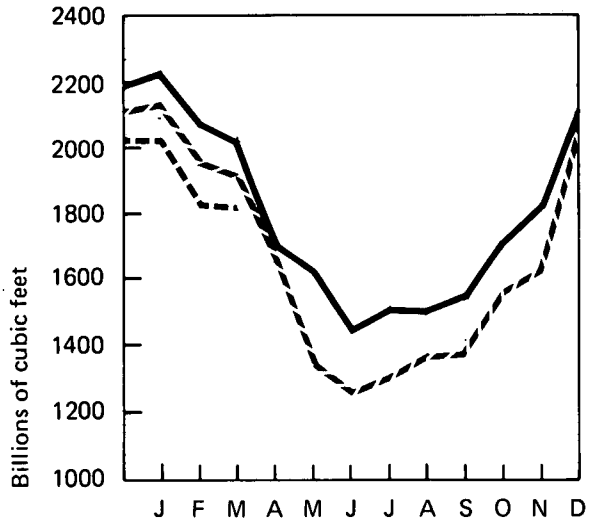
Net withdrawals from underground storage during February amounted to 219 billion cubic feet, leaving 1,463 billion cubic feet of working gas in underground storage at the end of the month. Since November 1, the beginning of the winter withdrawal season, a total of 1,153 billion cubic feet have been withdrawn from storage, amounting to 43.6 percent of the working gas volume on November 1.

Natural Gas

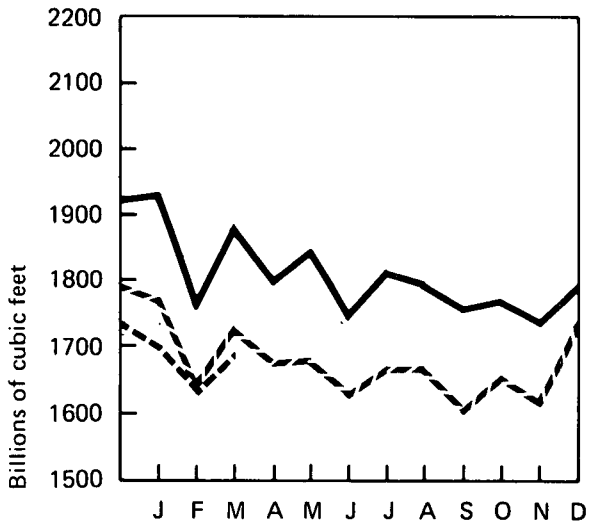
		Domestic Consumption*	Marketed Production*	Domestic Producer Sales to Major Interstate Pipelines	Imports
			Billion cubic feet		
1973	January	2,348	1,994	1,069	93
	February	2,126	1,821	963	84
	March	2,015	1,952	1,052	91
	April	1,835	1,864	1,007	88
	May	1,729	1,898	1,026	86
	June	1,534	1,839	963	79
	July	1,558	1,880	999	80
	August	1,582	1,896	994	85
	September	1,527	1,840	956	82
	October	1,708	1,875	1,001	91
	November	1,905	1,863	1,000	85
	December	2,182	1,926	1,038	89
	TOTAL	**22,049**	**22,648**	**12,067**	**1,033**
1974	January	2,230	1,929	1,033	86
	February	2,054	1,759	941	79
	March	2,003	1,886	1,027	85
	April	1,691	1,793	987	83
	May	1,608	1,846	981	80
	June	1,439	1,740	928	74
	July	1,514	1,818	947	74
	August	1,510	1,790	932	76
	September	1,537	1,755	870	70
	October	1,706	1,767	936	83
	November	1,827	1,729	921	82
	December	2,104	1,790	959	87
	TOTAL	**21,223**	**21,601**	**11,462**	**959**
1975	January	2,123	1,771	950	81
	February	1,943	1,635	867	75
	March	1,904	1,733	948	83
	April	1,651	1,669	906	83
	May	1,335	1,681	898	81
	June	1,255	1,626	859	78
	July	1,310	1,669	873	79
	August	1,370	1,668	882	76
	September	1,372	1,596	836	74
	October	1,560	1,656	877	81
	November	1,633	1,609	853	81
	December	R2,055	R1,730	903	84
	TOTAL	**R19,511**	**R20,053**	**10,652**	**956**
1976	January	R2,055	R**1,696	894	R83
	February	R1,820	***1,630	NA	R***76
	March	1,810	***1,690	NA	***82
	TOTAL (3 months)	**5,685**	**5,016**	**NA**	**241**

*See Explanatory Note 7.
**Preliminary data.
***Projected data.
R=Revised data. NA=Not available.
Note: All monthly Domestic Consumption data are estimated.
Sources: Consumption, Marketed Production, and Imports—Bureau of Mines; Domestic Producer Sales—Federal Power Commission.

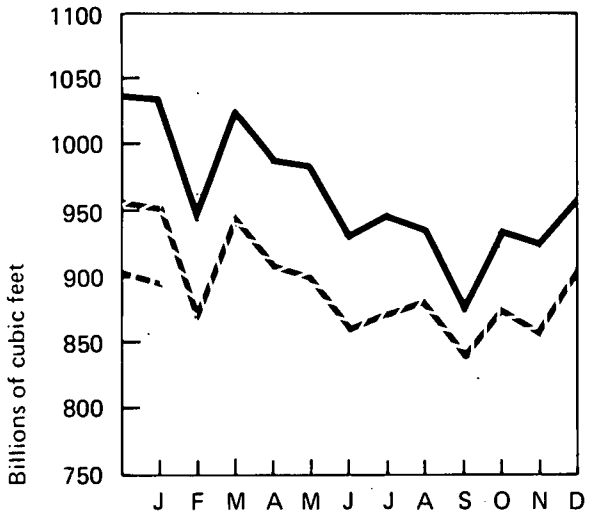
Domestic Consumption



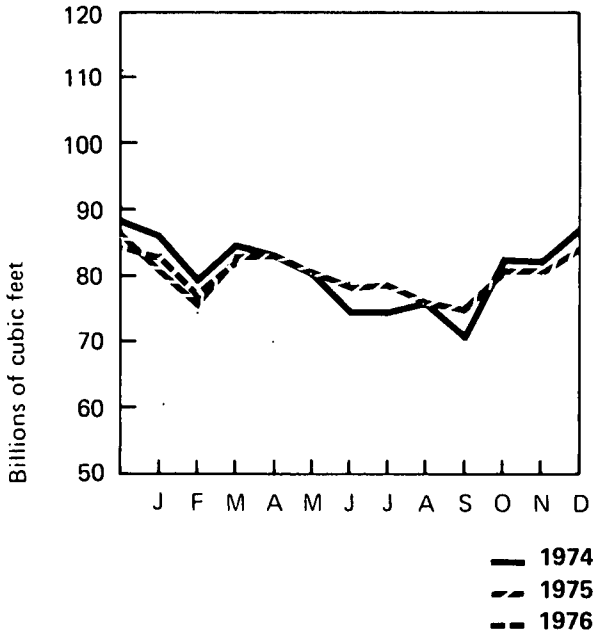
Marketed Production



Domestic Producer Sales to Major Interstate Pipelines



Imports

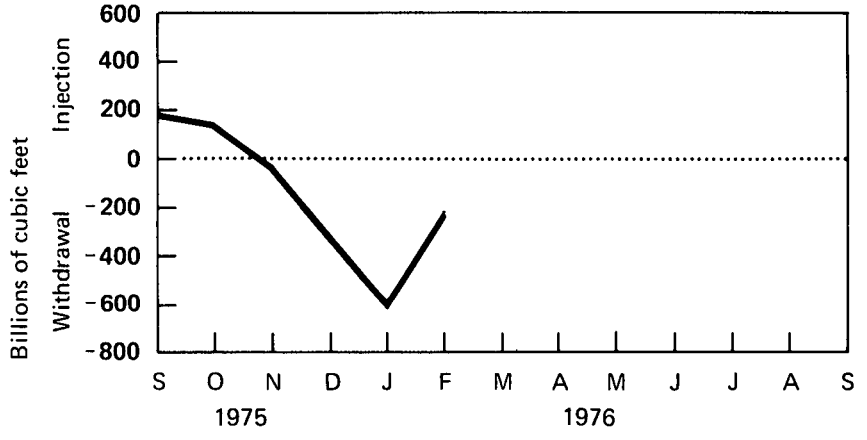


Natural Gas (Continued)

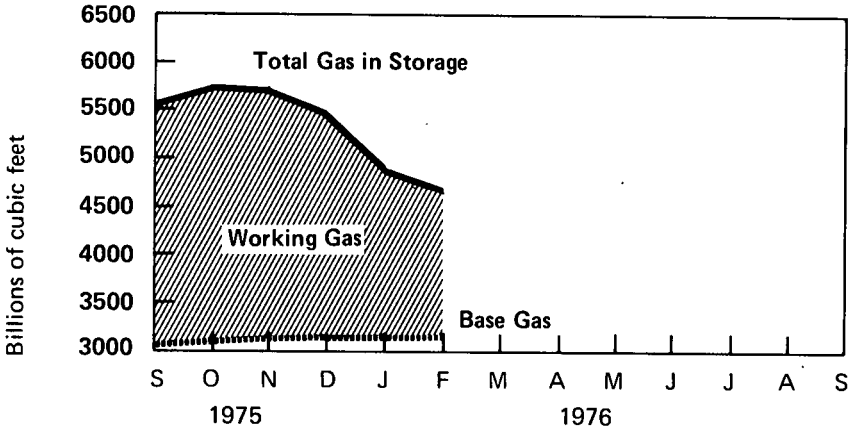
Natural Gas in Underground Storage*

		Total Gas in Storage	Base Gas	Working Gas	Storage Injections	Storage Withdrawals	Net Storage Injections
				Billion cubic feet			
1974	October**	5,445	3,042	2,403	***	***	***
1975	September	5,558	3,084	2,474	232	38	194
	October	5,770	3,128	2,642	185	51	134
	November	5,760	3,172	2,588	99	150	-51
	December	5,423	3,173	2,250	41	394	-353
1976	January	4,868	3,194	1,674	19	630	-611
	February	4,660	3,197	1,463	73	292	-219

Net Storage Injections



Gas in Storage



*See Explanatory Note 8.
**Data reported as of November 1, 1974.
***Between November 1, 1974, and August 31, 1975, a total of 1,658 billion cubic feet of gas was injected into storage and 1,686 billion cubic feet was withdrawn, for net storage injections of -28 billion cubic feet.
R=Revised data.
Sources: Federal Energy Administration and Federal Power Commission.

COAL

Domestic consumption of bituminous coal and lignite during 1975 totaled 554.8 million tons, only slightly higher (0.4 percent) than consumption for 1974.

February 1976 coal exports of 3.1 million tons were 31.8 percent lower than exports for February 1975.

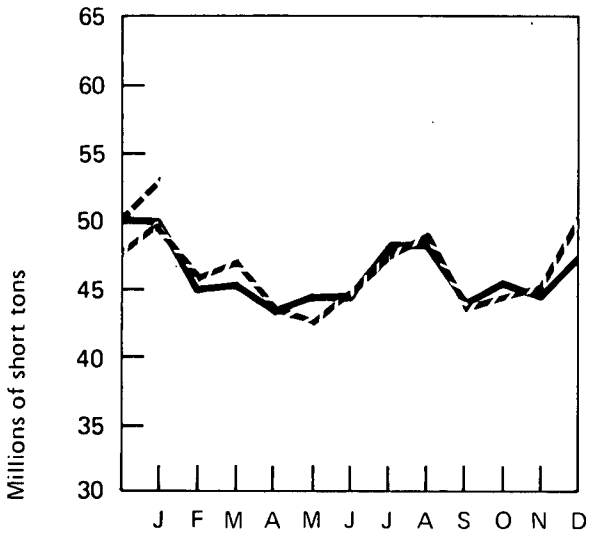
Production of bituminous coal and lignite during March 1976 was 60.5 million tons, an increase of 16.5 percent over production in March 1975.

Bituminous and Lignite

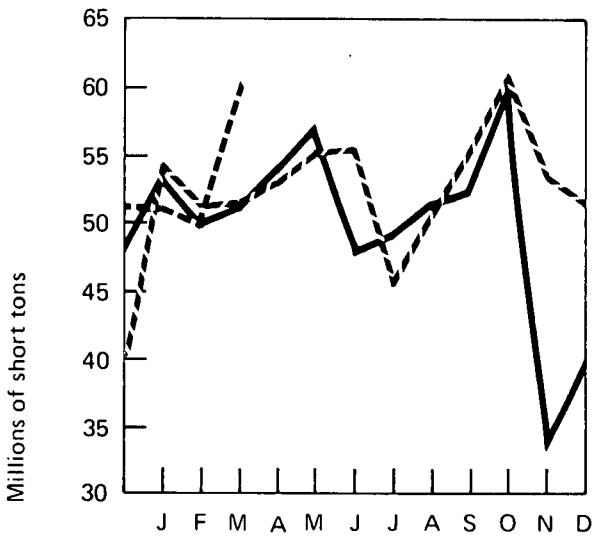
		Domestic Consumption*	Production*	Exports	Stocks
			Thousands of short tons		
1973	January	49,838	49,379	2,954	111,120
	February	44,652	45,893	2,669	108,870
	March	44,814	50,547	3,377	111,490
	April	42,689	46,999	5,063	112,585
	May	43,628	51,420	5,140	116,890
	June	45,115	46,613	4,969	109,960
	July	47,715	43,801	4,188	107,390
	August	48,840	55,874	5,133	106,910
	September	45,471	48,338	3,424	106,230
	October	46,427	54,382	5,882	107,490
	November	46,703	49,826	5,214	107,169
	December	50,130	48,666	4,889	103,022
	TOTAL**	**556,022**	**591,738**	**52,903**	
1974	January	50,046	53,712	2,813	97,836
	February	44,929	50,053	4,627	95,812
	March	45,858	51,278	3,179	101,568
	April	43,595	54,402	4,944	107,167
	May	44,951	57,662	6,032	112,882
	June	44,315	48,065	6,369	111,935
	July	48,605	49,392	5,307	106,160
	August	48,579	51,808	5,088	105,478
	September	43,844	52,686	4,893	109,173
	October	45,868	60,495	7,342	118,670
	November	44,598	33,702	6,744	109,192
	December	47,521	40,151	2,587	95,528
	TOTAL**	**552,709**	**603,406**	**59,926**	
1975	January	49,841	54,885	4,254	96,024
	February	45,726	51,135	4,470	97,164
	March	47,253	51,910	5,653	97,904
	April	43,567	53,135	6,159	102,745
	May	42,683	55,370	7,011	109,796
	June	44,887	55,730	6,269	115,041
	July	47,485	45,560	4,691	109,313
	August	49,091	51,160	5,859	108,680
	September	43,818	55,560	4,529	112,102
	October	44,563	61,000	4,647	120,116
	November	45,545	53,035	7,593	125,813
	December	R50,290	51,520	4,534	127,159
	TOTAL**	**R554,749**	**640,000**	**65,669**	
1976	January	***53,171	51,495	3,697	***119,802
	February	NA	50,005	3,050	NA
	March	NA	†60,500	NA	NA
	TOTAL**	NA	**162,000** (3 months)	**6,747** (2 months)	

*See Explanatory Note 9.
**Totals may not add due to rounding.
***FEA estimate based on data provided by BOM.
†Preliminary data.
R=Revised data. NA=Not available.
Source: Bureau of Mines.

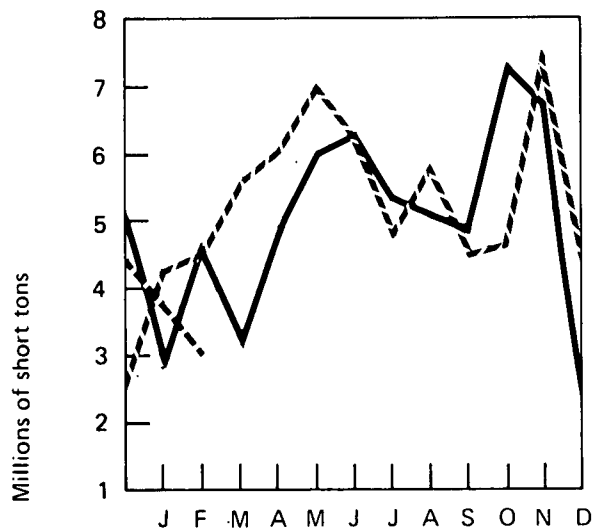
Domestic Consumption



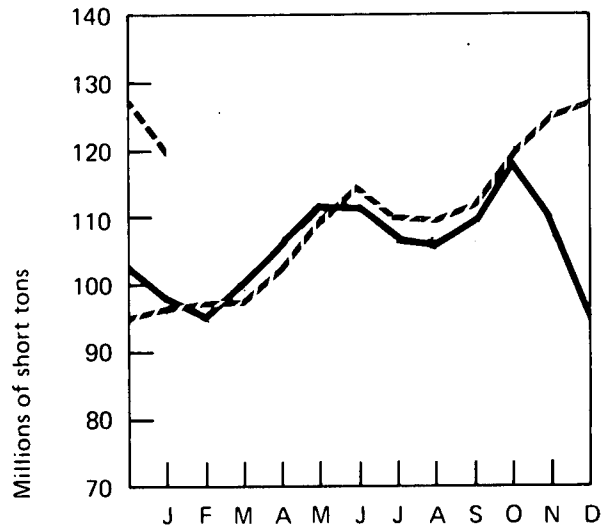
Production



Exports



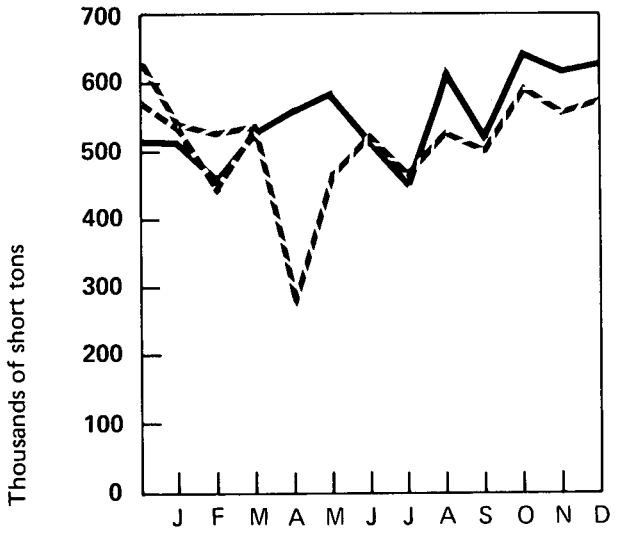
Stocks



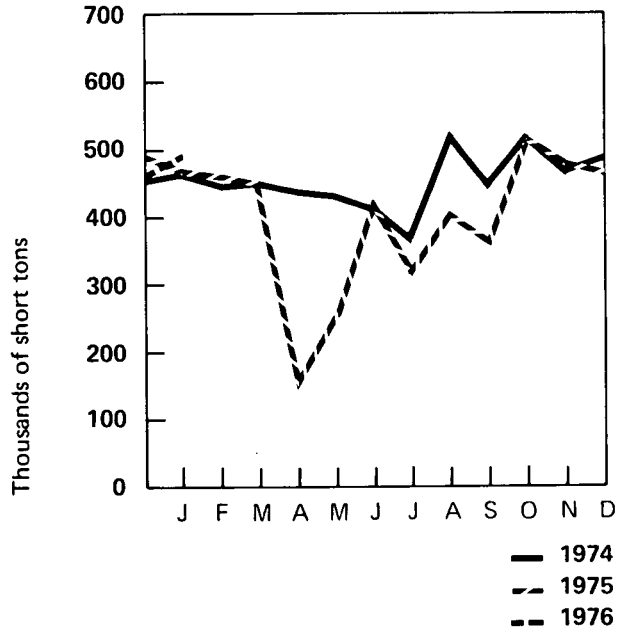
Anthracite

		Production	Domestic Consumption
		Thousands of short tons	
1973	January	522	485
	February	568	542
	March	641	513
	April	581	435
	May	641	524
	June	609	485
	July	434	373
	August	587	441
	September	532	457
	October	614	493
	November	582	464
	December	519	459
	TOTAL	**6,830**	**5,671**
1974	January	516	466
	February	458	441
	March	531	457
	April	563	437
	May	589	435
	June	505	412
	July	443	360
	August	620	526
	September	516	441
	October	641	522
	November	610	463
	December	625	488
	TOTAL	**6,617**	**5,488**
1975	January	535	470
	February	530	461
	March	540	453
	April	270	145
	May	470	261
	June	525	431
	July	460	310
	August	530	409
	September	495	360
	October	595	513
	November	550	479
	December	575	461
	TOTAL	**6,075**	**4,753**
1976	January	530	493
	February	440	NA
	March	525	NA
	TOTAL (3 months)	**1,495**	**NA**

Production



Domestic Consumption



R=Revised data. NA=Not available.
Sources: Production and annual consumption data are from Bureau of Mines; monthly consumption data are FEA estimates based on figures provided by Bureau of Mines.

Part 5

Electric Utilities

ELECTRIC UTILITIES

Preliminary data indicate that March 1976 production of electricity by utilities was 162.6 billion kilowatt hours, 5.0 percent above the level for March 1975. Electricity output during the first quarter totaled 500.1 billion kilowatt hours, an increase of 7.6 percent over the output level for the same quarter of 1975.

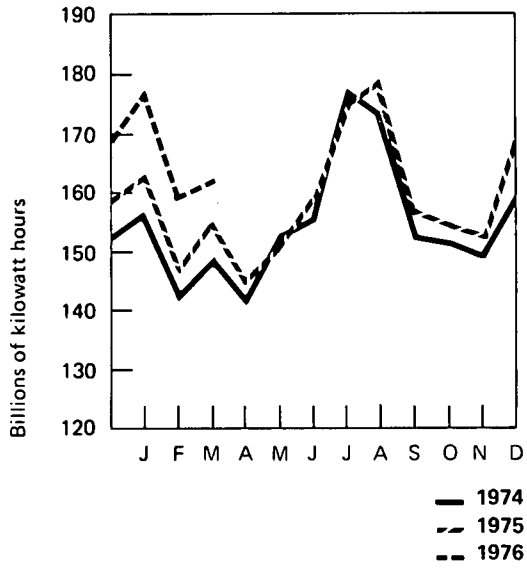
Utility fossil fuel requirements were accordingly greater during the first 2 months of 1976. Electric utilities consumed 10.7 percent more coal, 3.4 percent more oil, and 2.8 percent more natural gas than during the first 2 months of 1975.

Coal stockpiles at powerplants increased from an 82-day supply at the end of January to an 87-day supply at the end of February. Oil stockpiles increased from a 65- to a 76-day supply during the month.

Electric Utilities

		Total Net Production	Percentage Produced from Each Source					
		Millions of kilowatt hours	Coal	Oil	Gas	Nuclear	Hydro-electric	Other*
1973	January	159,320	47.2	19.4	13.1	3.9	16.3	0.1
	February	143,109	47.4	18.2	14.1	4.1	16.1	0.1
	March	147,754	45.7	16.2	16.2	4.5	17.3	0.1
	April	139,273	46.1	14.4	17.9	4.2	17.3	0.1
	May	147,021	44.3	14.7	20.2	3.9	16.8	0.1
	June	160,962	43.3	16.1	21.6	4.2	14.7	0.1
	July	173,461	43.9	16.5	22.6	4.0	12.9	0.1
	August	177,022	44.4	17.3	21.9	4.4	11.9	0.1
	September	156,294	45.7	17.3	21.1	4.9	10.9	0.1
	October	153,797	45.6	17.7	19.9	4.9	11.8	0.1
	November	147,823	47.2	17.6	16.1	5.5	13.5	0.1
	December	153,284	47.9	16.3	13.3	5.3	17.0	0.2
	TOTAL	**1,859,120**	**AVERAGE 45.7**	**16.8**	**18.3**	**4.5**	**14.6**	**0.1**
1974	January	156,906	47.0	16.6	13.3	4.8	18.2	0.1
	February	142,371	46.6	15.7	13.3	5.6	18.6	0.2
	March	149,933	45.3	14.6	15.8	5.8	18.4	0.1
	April	141,914	44.5	13.9	16.9	4.9	19.6	0.2
	May	153,439	44.3	14.7	18.4	4.2	18.2	0.2
	June	156,027	43.3	14.7	20.3	4.4	17.1	0.2
	July	177,798	42.9	15.6	20.9	5.6	14.8	0.2
	August	173,699	43.1	15.6	20.3	7.0	13.8	0.2
	September	152,084	42.9	16.4	19.3	7.1	14.1	0.2
	October	151,786	44.3	16.7	18.6	7.0	13.2	0.2
	November	149,581	44.9	18.4	15.2	7.2	14.1	0.2
	December	159,309	45.6	19.3	12.4	8.1	14.4	0.2
	TOTAL	**1,864,847**	**AVERAGE 44.5**	**16.1**	**17.2**	**6.0**	**16.1**	**0.1**
1975	January	163,498	45.8	18.7	12.1	8.1	15.2	0.1
	February	146,338	46.0	17.0	12.3	8.3	16.3	0.1
	March	154,932	44.6	15.0	13.0	9.2	18.1	0.1
	April	145,289	44.2	14.6	14.0	8.7	18.3	0.2
	May	151,168	42.5	13.9	16.9	8.2	18.3	0.2
	June	159,963	43.4	14.3	18.0	7.2	16.9	0.2
	July	175,856	43.1	14.2	19.4	8.6	14.5	0.2
	August	179,202	43.9	15.6	19.0	8.7	12.6	0.2
	September	156,802	44.8	13.7	19.1	9.1	13.1	0.2
	October	154,748	44.6	14.2	17.0	9.4	14.6	0.2
	November	152,334	46.0	14.2	14.3	9.3	16.0	0.2
	December	168,654	46.5	15.9	12.3	9.7	15.4	0.2
	TOTAL	**1,908,784**	**AVERAGE 44.6**	**15.1**	**15.7**	**8.7**	**15.7**	**0.2**
1976	January	R177,873	47.0	18.1	11.1	8.9	14.7	0.2
	February	R159,628	46.4	16.2	12.1	R9.7	15.4	0.2
	March	162,631	NA	NA	NA	8.6	NA	NA
	TOTAL (3 months)	**500,132**						

Total Net Production



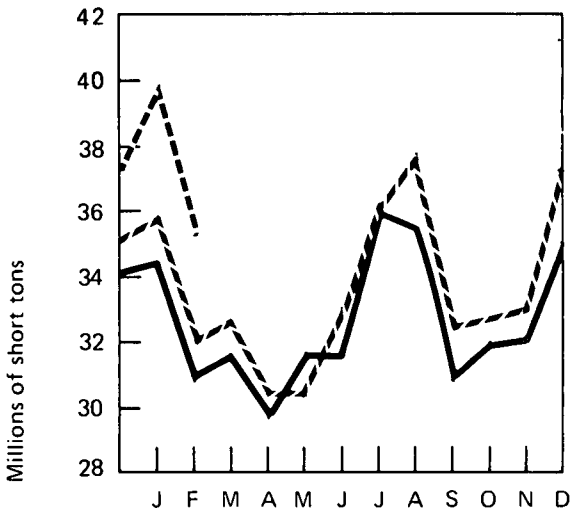
*Includes electricity produced from geothermal power, wood, and waste.
R=Revised data. NA=Not available.
Sources: Federal Power Commission.
Production data for latest month are from Edison Electric Institute.

Fuel Consumption

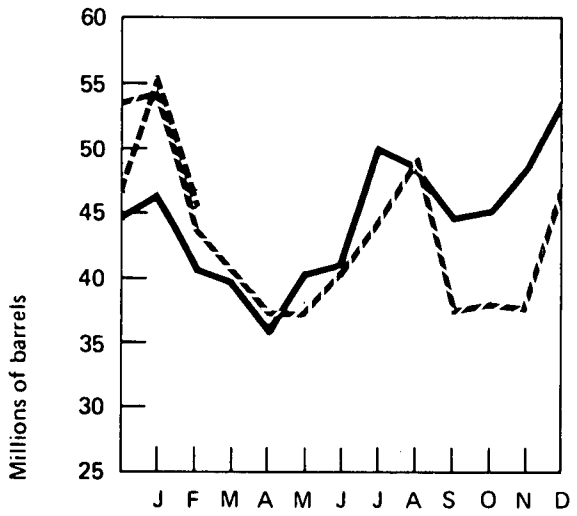
		Coal	Oil	Gas
		Thousands of short tons	Thousands of barrels	Millions of cubic feet
1973	January	34,591	55,773	219,270
	February	30,921	46,978	212,983
	March	30,746	42,701	255,314
	April	29,209	35,845	267,151
	May	29,683	38,097	316,989
	June	31,951	46,421	371,221
	July	34,863	51,352	422,396
	August	36,093	55,356	419,507
	September	32,814	48,103	353,040
	October	32,470	48,188	328,630
	November	32,154	46,420	252,341
	December	34,141	44,850	216,988
	TOTAL	**389,636**	**560,084**	**3,635,830**
1974	January	34,599	46,745	219,338
	February	30,857	40,687	201,587
	March	31,638	39,645	254,175
	April	29,679	35,959	259,313
	May	31,700	40,831	306,945
	June	31,719	41,227	346,584
	July	36,111	50,119	403,391
	August	35,555	48,970	380,585
	September	30,989	44,550	313,079
	October	32,127	45,268	298,109
	November	32,211	48,525	238,908
	December	35,176	53,648	207,095
	TOTAL	**392,361**	**536,174**	**3,429,109**
1975	January	35,853	54,169	204,931
	February	32,104	43,670	188,684
	March	32,783	40,399	210,283
	April	30,452	37,099	213,580
	May	30,410	37,015	271,790
	June	33,058	40,791	306,147
	July	36,367	44,329	359,160
	August	37,839	49,262	359,117
	September	32,488	37,207	315,165
	October	32,811	38,099	274,122
	November	33,185	37,604	227,070
	December	37,324	46,727	213,246
	TOTAL	**404,674**	**506,371**	**3,143,295**
1976	January	39,887	56,076	204,410
	February	35,364	45,109	200,369
	TOTAL (2 months)	**75,251**	**101,185**	**404,779**

Source: Federal Power Commision.

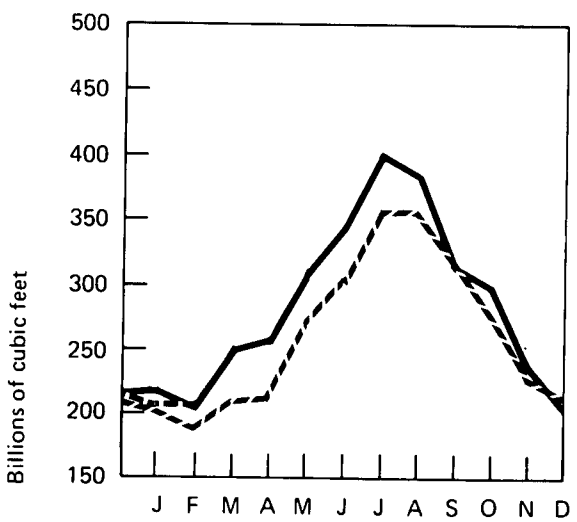
Coal Consumption



Oil Consumption



Gas Consumption

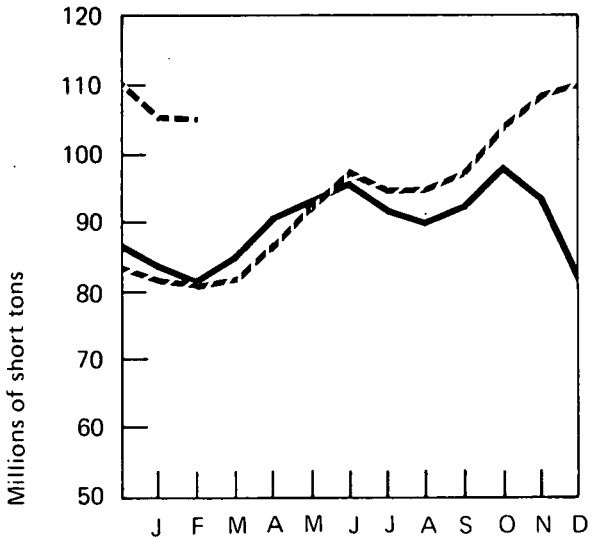


— 1974
-- 1975
-- 1976

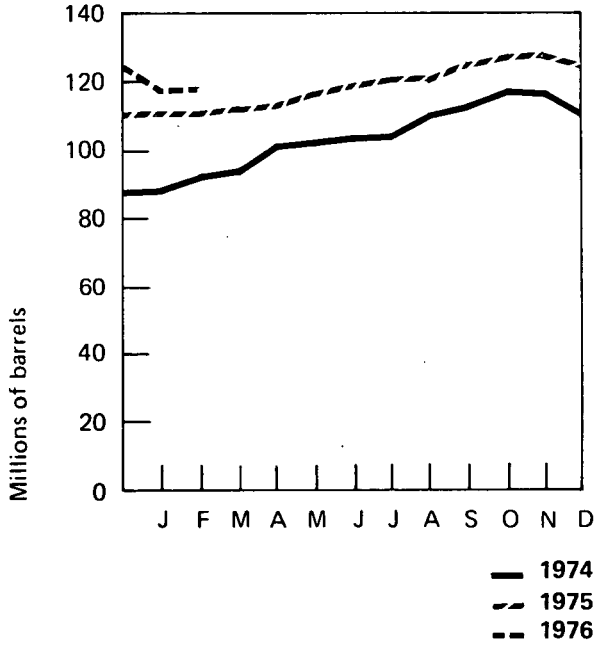
Electric Utilities (Continued)

		Stocks at End of Month	
		Coal	Oil
		Thousands of short tons	Thousands of barrels
1973	January	95,017	53,691
	February	92,993	50,858
	March	93,986	54,885
	April	94,991	62,411
	May	98,722	64,259
	June	97,995	65,003
	July	92,215	67,987
	August	91,356	73,259
	September	90,156	74,863
	October	91,428	76,343
	November	90,369	81,224
	December	86,880	88,228
1974	January	83,366	89,053
	February	80,962	92,645
	March	84,257	94,187
	April	90,901	100,210
	May	93,628	103,606
	June	95,811	104,316
	July	91,616	105,919
	August	89,691	110,997
	September	92,704	113,570
	October	98,373	117,564
	November	93,825	116,558
	December	83,652	111,990
1975	January	81,429	110,304
	February	81,065	111,581
	March	81,872	113,377
	April	86,656	113,930
	May	93,027	116,940
	June	97,834	119,653
	July	94,067	121,076
	August	94,107	120,601
	September	97,790	126,137
	October	104,776	128,338
	November	109,065	129,629
	December	110,688	125,028
1976	January	105,301	117,575
	February	105,609	118,509

Coal Stocks



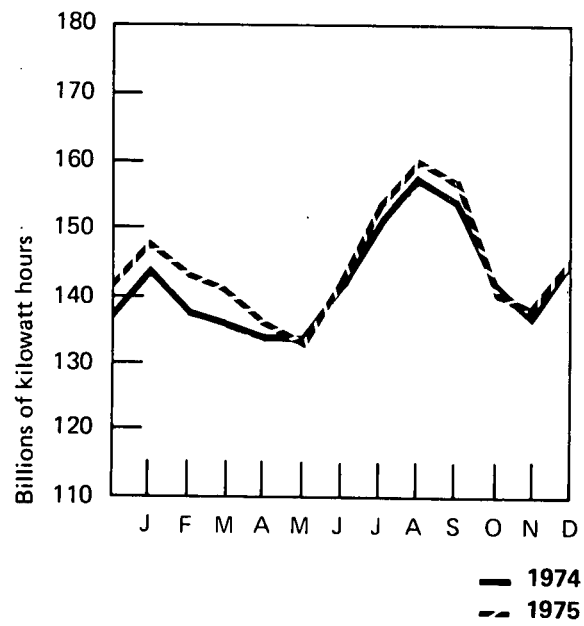
Oil Stocks



Source: Federal Power Commission.

		Sales				
		Residential	Commercial	Industrial	Other*	Total
		Millions of kilowatt hours				
1973	January	52,840	31,182	55,274	5,209	144,505
	February	49,601	30,445	54,591	4,909	139,546
	March	46,315	30,100	55,866	4,822	137,103
	April	41,821	29,038	55,937	4,571	131,367
	May	39,825	30,060	56,838	4,638	131,361
	June	44,967	33,194	57,368	4,764	140,293
	July	54,123	36,147	57,152	5,140	152,562
	August	56,742	36,820	58,865	5,054	157,481
	September	56,210	36,711	59,178	5,211	157,310
	October	47,207	33,289	60,514	5,032	146,042
	November	43,175	31,363	58,464	5,085	138,087
	December	46,442	29,788	56,190	4,896	137,316
	TOTAL	**579,268**	**388,137**	**686,237**	**59,331**	**1,712,973**
1974	January	52,846	30,608	55,754	4,995	144,203
	February	47,832	29,542	54,978	4,708	137,060
	March	46,154	29,309	55,999	4,693	136,155
	April	43,294	28,986	56,497	4,610	133,387
	May	41,215	29,876	57,386	4,685	133,162
	June	46,596	32,800	58,077	4,641	142,114
	July	53,435	35,229	57,899	4,965	151,528
	August	56,558	36,414	59,803	5,069	157,844
	September	53,252	35,830	60,366	4,983	154,431
	October	44,177	32,112	60,053	4,792	141,134
	November	42,773	30,968	57,361	4,969	136,071
	December	50,368	31,757	53,878	4,974	140,977
	TOTAL	**578,500**	**383,431**	**688,051**	**58,084**	**1,708,066**
1975	January	55,547	33,026	54,280	5,245	148,098
	February	52,185	32,441	53,142	4,984	142,752
	March	49,974	32,005	53,182	4,914	140,075
	April	46,883	31,335	52,526	4,737	135,481
	May	43,226	31,608	53,364	4,745	132,943
	June	48,461	35,266	54,104	4,777	142,608
	July	56,829	37,891	53,973	5,052	153,745
	August	59,979	38,768	56,067	5,223	160,037
	September	56,983	37,550	56,797	5,320	156,650
	October	45,142	33,329	56,486	5,194	140,151
	November	44,019	32,288	56,174	5,235	137,716
	December	51,900	33,183	55,532	5,357	145,972
	TOTAL	**611,128**	**408,690**	**655,627**	**60,783**	**1,736,228**

Total Sales



*Includes street lighting and trolley cars.
Source: Federal Power Commission.

Part 6

Nuclear Power

NUCLEAR POWER

The 53 domestic reactors in commercial operation, with a total maximum dependable capacity of 34,061 megawatts, functioned at 54 percent of capacity in March, down from the 60 percent level of February. This decline was predominantly the result of plant shutdowns for refueling which are normally scheduled at this time of the year.

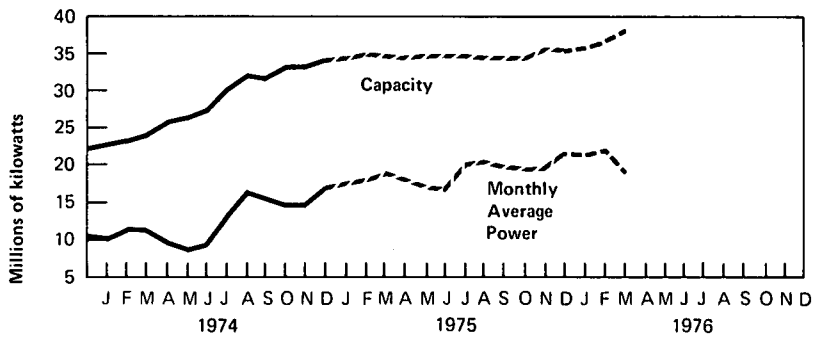
The St. Lucie 1 nuclear powerplant received an operating license on March 1. The plant is an 810-megawatt pressurized water reactor situated on the Atlantic Coast at St. Lucie, Florida, and owned by the Florida Power and Light Company. A second unit is presently planned for operation in the 1980's at the site.

New orders for nuclear reactors declined significantly in 1975. Seven reactors, with a capacity totaling 7,770 megawatts, were committed during the year, a decrease from 25 orders in 1974 and 35 during 1973. Industry sources foresee no reverse in this downtrend in 1976, and forecast that only 6 units, totaling 7,150 megawatts, will be ordered during the year.

U.S. Nuclear Powerplant Operations*

		Maximum Dependable Capacity	Average Power	Percent of Total Domestic Electricity Generation
		Thousands of net kilowatts		
1973	January	13,594	8,395	3.9
	February	13,594	8,821	4.1
	March	14,382	8,991	4.5
	April	15,253	8,161	4.2
	May	16,126	7,657	3.9
	June	17,827	9,429	4.2
	July	17,827	9,355	4.0
	August	19,349	10,463	4.4
	September	20,400	10,815	4.9
	October	20,400	10,036	4.9
	November	21,271	11,308	5.5
	December	22,826	10,543	5.3
	AVERAGE	**17,761**	**9,513**	**4.5**
1974	January	23,156	10,194	4.8
	February	23,926	11,992	5.6
	March	24,455	11,715	5.8
	April	26,012	9,826	4.9
	May	26,820	8,791	4.2
	June	27,898	9,740	4.4
	July	30,524	13,577	5.6
	August	32,195	16,442	7.0
	September	31,759	15,159	7.1
	October	33,614	14,409	7.1
	November	33,630	14,528	7.2
	December	34,467	17,375	8.1
	AVERAGE	**29,071**	**12,865**	**6.0**
1975	January	34,841	17,843	8.1
	February	35,049	18,063	8.3
	March	34,836	19,091	9.2
	April	34,167	17,516	8.7
	May	34,167	16,613	8.2
	June	34,472	16,097	7.2
	July	34,746	20,297	8.6
	August	34,739	20,618	8.7
	September	34,690	19,892	9.1
	October	34,690	19,464	9.4
	November	35,902	19,586	9.3
	December	35,574	21,985	9.7
	AVERAGE	**34,823**	**18,926**	**8.7**
1976	January	36,750	R21,315	8.9
	February	36,879	R22,213	R9.7
	March	**38,072	**18,889	**8.6
	AVERAGE (3 months)	**37,241**	**20,775**	**9.1**

U.S. Nuclear Powerplants



*Includes all units licensed to operate, whether in commercial operation or power ascension status.
**Preliminary data.
R=Revised data.

Sources: Average Power for latest month and Capacity are from U.S. Nuclear Regulatory Commission; Percent of Total Domestic Electricity Generation for latest month is based on data from Edison Electric Institute; remaining data are from Federal Power Commission.

Status of Nuclear Powerplants – March 31, 1976

Status	Number of Plants					Design Capacity
	Boiling Water Reactors	High-Temperature Gas Reactors	Pressurized Water Reactors	Other*	Total	Net Electrical Megawatts
Licensed to operate	23	1	34	0	58	41,000
Construction permit granted	21	0	48	0	69	71,000
Construction permit pending	22	0	44	5	71	78,000
Orders placed for plant	3	0	14	0	17	20,000
Publicly announced	–	–	–	21	21	26,000
TOTAL	**69**	**1**	**140**	**26**	**236**	**236,000**

*Includes 1 Liquid Metal Fast Breeder Reactor and 25 announced intentions to order for which a reactor type has not been chosen.
Source: U.S. Nuclear Regulatory Commission.

U.S. Uranium Enrichment – March 1976

	Domestic Customers	Foreign Customers	Total
Separative Work Performed (in metric tons of separative work units)	318.481	568.722	887.203
Cost (in millions of dollars)	18.620	31.988	50.608
Product Quantity (in metric tons of uranium)	76.711	180.816	257.527
Average Enrichment (in percent U-235)	2.908	2.470	2.601
Feed Requirement (in metric tons of uranium)	406.504	797.123	1,203.627

Source: U.S. Energy Research and Development Administration.

Nuclear Power Generation by Major Non-Communist Countries – March 1976

Country	Number of Reactors*	Capacity	Generation of Electricity			
			Generation	Percent of Design Capacity		
			March	March	Year	
					1974	1975
		Thousands of gross electrical kilowatts	Millions of gross kilowatt hours			
Canada	5	2,380	1,315	74	74	64
Federal Republic of Germany	7	3,450	2,273	89	57	72
France	10	3,070	1,500	66	57	68
Great Britain	29	6,140	**3,830	**84	61	57
India	3	620	191	41	55	46
Italy	3	620	309	67	61	69
Japan	12	6,600	2,576	52	61	36
Spain	3	1,120	695	83	75	77
Sweden	5	3,310	1,265	51	20	44
Switzerland	3	1,050	758	97	76	84
United States	55	39,350	14,769	50	57	60
TOTAL	**135**	**67,710**	**29,481**	**59**	**58**	**58**

*Includes only operational units, i.e., those which have generated electricity during, or prior to, the current month.
**Figures are for 5-week operating period.
Source: *Nucleonics Week.*

Summary of Monthly Nuclear Fuel Cycle – February 1976

Fuel Cycle Activity	Product	Processed Material*	Percent Utilization of Industry Capacity	Energy Content of Processed Material**	Energy Consumed in Fuel Cycle Activity***	Cost Contribution to Electric Power†
		MTU except where noted		Billion BTU		Mills per kilowatt hour
Milling	Yellowcake (U_3O_8) Deliveries	750	67.5	256,000	420	1.04
Conversion	Uranium Hexafluoride (UF_6) Deliveries	1,028	71.4	351,000	222	0.07
Enrichment	Enriched UF_6 Deliveries	114 (423 MT-SWU)	††	233,000	3,300	0.86
Fabrication	Finished Fuel Assemblies Produced	149	62.1	305,000	230	0.46
Powerplant Operation	New Fuel Receipts	180	–	369,000	–	–
	Electricity Generated	15,136 (million kWhe)	63	161,000	757 (million kWhe)	9.82
	Spent Fuel Discharged	112	–	–	–	–
Reprocessing	Spent Fuel Received	0	–	–	–	0.97
	Spent Fuel Reprocessed	0	–	–	–	–

*Units of measure are discussed in Explanatory Notes 10 and 11.
**Assumes 25,000 MWD/MTU for heat content of enriched uranium and a 6.1 feed to product ratio at the enrichment plant.
***Energy requirements for processing are obtained from U.S.A.E.C. Report No. WASH 1248.
†Cost contribution is computed from unit prices paid for current month's production and requirement for a model 1000 MWh reactor operating at 80 percent capacity factor, given in U.S.A.E.C. Report No. WASH 1174-74. Because of the long lead time required for nuclear fuel processing, the sum of numbers in this column does not necessarily reflect the fuel cost of current electricity production.
††EDRA's enrichment plans are presently operating at maximum utilization of available electric power, with the excess production being placed in the "preproduction stockpile" in anticipation of high demand for enriched uranium in the 1980's.
Source: FEA.

ENERGY CONSUMPTION

Domestic energy consumption for the 29 days in February 1976 totaled 6.272 quadrillion Btu, 2.7 percent above the February 1975 level of 6.107 and 1.1 percent above the February 1974 level of 6.204. No sectoral breakdown is available for the month as yet.

The revised consumption total for January was 6.951 quadrillion Btu, of which 3.091 quadrillion Btu was consumed by the residential and commercial sector, up 7.1 percent from the January 1975 level and up 8.4 percent from the January 1974 level. Direct consumption of primary fuels amounted to 61.9 percent of the total sector consumption (coal was 1.1 percent, dry natural gas, 39.8 percent, and petroleum products, 21.1 percent). Consumption of electricity accounted for the remaining 38.1 percent.

The industrial sector consumed 2.208 quadrillion Btu during January 1976, down 5.9 percent from the January 1975 level and down 9.9 percent from the level for January 1974. Coal accounted for 15.0 percent of the total, 27.2 percent was dry natural gas, 26.9 percent was petroleum products, and 30.9 percent was electricity.

Consumption in the transportation sector was 1.651 quadrillion Btu, up 4.0 percent from the January 1975 level and up 10.8 percent from the level for January 1974. Petroleum products comprised 94.7 percent of the total. Natural gas used for pipeline transportation, and electricity used by railroads and for street and highway lighting, accounted for the balance.

PETROLEUM CONSUMPTION AND FORECAST

Total demand for petroleum products during March 1976 was 17.325 million barrels per day, 3.4 percent above the forecast level and 6.2 percent above the level for March 1975.

Domestic demand for motor gasoline during March was 6.808 million barrels per day, which was 5.7 percent higher than the forecast level and 7.6 percent greater than demand for last March.

Domestic demand for distillate fuel oil in March, at 3.244 million barrels per day, was 3.8 percent below the forecast level. The low demand was attributed to abnormally warm weather.

Domestic demand for residual fuel oil during March of 2.716 million barrels per day was nearly equal to the forecast level of 2.730 million barrels per day, but was 1.8 percent above the level for last March.

Energy Consumption by Economic Sector and Primary Source – January 1976 [Quadrillion (10^{15}) Btu]

Sector[1]	Primary Energy Source					Primary Energy Consumption	Electricity Distributed[7]	Net Energy Consumption	Electrical Energy Loss Distributed[8]	Ultimate Energy Disposition
	Coal[2]	Natural Gas (dry)[3]	Petroleum[4]	Hydroelectric[5]	Nuclear[6]					
Residential and Commercial	0.033	1.229	0.652	–	–	1.913	P0.340	2.253	P0.839	P3.091
Industrial	0.331	0.600	0.594	0.003	–	1.528	P0.196	1.724	P0.484	P2.208
Transportation	0.001	0.066	1.564	–	([9])	1.631	P0.006	1.637	0.015	P1.651
Electric Utilities	0.875	0.210	0.343	0.282	0.169	1.879	–	–	–	–
TOTAL	**1.239**	**2.104**	**3.153**	**0.285**	**0.169**	**6.951**	**P0.542**	**5.614**	**P1.337**	**P6.951**

[1] See Explanatory Note 12 for definitions of the Residential and Commercial, Industrial, Transportation, and Electric Utilities Sectors.

[2] Data are from the Bureau of Mines. Includes anthracite and bituminous coal and lignite.

[3] Aggregate data are from the Bureau of Mines. FPC provided data on natural gas consumed by electric utilities. Data from the American Gas Association are used for the Residential and Commercial Sector, adjusted to include a portion of the AGA "Other" category. Natural gas used in transportation, mostly for pipeline use, is estimated to be 3.5 percent of total natural gas consumption less electric utilities. This percentage is derived from 1974 Bureau of Mines data on consumption. The Industrial Sector is then the difference between the total and the sum of the other sectors.

[4] Aggregate petroleum data are from the Bureau of Mines. FPC provided data on oil consumed by electric utilities. Petroleum consumed in transportation was calculated based on Department of Transportation data as follows: Motor gasoline - 100 percent; naphtha jet fuel - 100 percent; kerosine jet fuel - 97 percent; distillate fuel oil - 30.3 percent; residual fuel oil - 11.2 percent; all other products - 4.7 percent. The remainder is distributed to economic sectors using the following percentage shares, derived from 1974 Bureau of Mines data on consumption: Residential and Commercial - 52.3 percent; Industrial - 47.7 percent.

[5] FPC hydroelectric power production plus net imports of electricity from Canada. These imports, estimated at 0.011 quadrillion Btu per month, were assumed to be from hydroelectric power sources. Monthly industrial hydroelectric power consumption is estimated to be one-twelfth of the preliminary Bureau of Mines annual figure for 1975.

[6] FPC nuclear power production.

[7] Electricity was distributed using FPC and Edison Electric Institute data on kilowatt-hour sales to ultimate customers. Electrical energy consumed by railroads and for street and highway lighting was distributed to the Transportation Sector. All "other" sales, largely for use in government buildings, were distributed to the Residential and Commercial Sector.

[8] In generating electricity with nuclear or fossil fuels, approximately 65 percent of the energy is lost in the form of heat. Transmission and distribution losses consume about an additional 3 percent of the energy inputs of the utility industry. In order to fully account for all energy consumed both directly and indirectly (i.e., ultimate energy disposition), the electricity losses are allocated to the final end-use sectors in proportion to their direct kilowatt-hour usage.

[9] Negligible.

P=Preliminary.

Percent Changes in Energy Consumption for January 1976 by Sources and Economic Sectors

	January 1976 Consumption	Percent Change from January 1975
	Quadrillion Btu	
Refined Petroleum Products	3.159	+2.7
Motor Gasoline	1.056	+4.5
Jet Fuel	0.187	+3.4
Distillate	0.780	+9.3
Residual	0.558	-11.6
Other Petroleum Products	0.578	+5.1
Natural Gas (Dry)	2.104	-3.2
Coal (Anthracite, bituminous, and lignite)	1.239	+6.7
Electricity (Sales)	P0.542	+7.2
TOTAL ENERGY USE	6.951	+1.9
Economic Sector Consumption		
Residential and Commercial	3.091	+7.1
Industrial	2.208	-5.9
Transportation	1.651	+4.1

P=Preliminary.

Energy Consumption (Continued)

Energy Consumption by the Residential and Commercial Economic Sector[1]

		Coal	Natural Gas (dry)	Petroleum[2]	Electricity Distributed	Electrical Energy Loss Distributed	Total Energy Use	Cumulative Total Energy Use
				Quadrillion (10^{15}) Btu				
1973	January	0.038	1.257	0.707	0.299	0.716	3.017	3.017
	February	0.032	1.113	0.653	0.285	0.610	2.693	5.710
	March	0.025	0.925	0.620	0.272	0.629	2.471	8.181
	April	0.016	0.745	0.527	0.253	0.569	2.109	10.290
	May	0.017	0.539	0.562	0.250	0.612	1.980	12.270
	June	0.017	0.354	0.511	0.279	0.714	1.873	14.143
	July	0.017	0.279	0.503	0.321	0.814	1.934	16.077
	August	0.018	0.253	0.560	0.332	0.835	1.997	18.074
	September	0.024	0.276	0.538	0.330	0.690	1.859	19.933
	October	0.028	0.344	0.592	0.287	0.651	1.902	21.835
	November	0.031	0.610	0.658	0.266	0.615	2.180	24.015
	December	0.033	0.882	0.648	0.271	0.665	2.500	26.515
	TOTAL	**0.295**	**7.577**	**7.077**	**3.445**	**8.120**	**26.515**	
1974	January	R0.040	1.158	R0.662	0.296	R0.696	R2.851	R2.851
	February	R0.034	1.027	R0.590	0.275	R0.599	R2.525	R5.376
	March	R0.027	0.902	R0.569	0.268	R0.642	R2.409	R7.785
	April	0.019	0.754	R0.530	0.258	R0.595	R2.155	R9.940
	May	R0.016	0.499	R0.497	0.254	R0.654	R1.920	R11.859
	June	R0.015	0.357	R0.503	0.282	R0.684	R1.841	R13.701
	July	R0.014	0.293	R0.507	0.315	R0.843	R1.972	R15.672
	August	0.021	0.265	R0.519	0.330	R0.807	R1.941	R17.613
	September	R0.025	0.278	0.513	0.316	R0.651	R1.784	R19.397
	October	R0.027	0.395	R0.589	0.271	R0.636	R1.919	R21.316
	November	R0.027	0.569	R0.583	0.263	R0.636	R2.078	R23.394
	December	R0.031	0.930	R0.628	0.292	R0.736	R2.617	R26.010
	TOTAL	**R0.297**	**7.427**	**R6.688**	**3.420**	**R8.178**	**R26.010**	
1975	January	R0.035	1.124	R0.648	0.315	R0.764	R2.886	R2.886
	February	R0.024	1.105	R0.553	0.300	R0.652	R2.634	R5.521
	March	R0.024	1.018	R0.566	0.291	R0.700	R2.599	R8.119
	April	0.011	0.905	R0.506	0.278	R0.639	R2.339	R10.459
	May	R0.010	0.522	R0.457	0.267	R0.671	R1.927	R12.386
	June	R0.014	0.332	R0.452	0.297	R0.746	R1.842	R14.227
	July	0.017	0.293	R0.482	0.336	R0.864	R1.990	R16.218
	August	0.014	0.264	R0.461	0.350	R0.878	R1.966	R18.184
	September	0.015	0.281	R0.501	0.336	R0.684	R1.825	R20.010
	October	0.015	0.353	R0.555	0.280	R0.677	R1.880	R21.890
	November	0.015	0.523	R0.517	0.273	R0.659	R1.987	R23.876
	December	0.014	0.910	R0.643	0.303	R0.778	R2.648	R26.524
	TOTAL	**R0.208**	**7.629**	**R6.340**	**3.625**	**R8.722**	**R26.524**	
1976	January	P0.033	1.229	0.652	P0.340	P0.839	P3.091	

Energy Consumption by the Industrial Economic Sector[1]

		Coal	Natural Gas (dry)	Petroleum[3]	Hydroelectric	Electricity Distributed	Electrical Energy Loss Distributed	Total Energy Use	Cumulative Total Energy Use
					Quadrillion (10^{15}) Btu				
1973	January	0.393	0.832	0.640	0.003	0.189	0.452	2.508	2.508
	February	0.362	0.764	0.591	0.003	0.186	0.399	2.305	4.813
	March	0.369	0.802	0.561	0.003	0.191	0.441	2.366	7.179
	April	0.363	0.794	0.477	0.003	0.191	0.430	2.257	9.436
	May	0.369	0.846	0.508	0.003	0.194	0.475	2.395	11.831
	June	0.351	0.787	0.462	0.003	0.196	0.502	2.301	14.132
	July	0.345	0.836	0.455	0.003	0.195	0.494	2.328	16.459
	August	0.340	0.888	0.506	0.003	0.201	0.505	2.444	18.903
	September	0.329	0.876	0.487	0.003	0.202	0.422	2.320	21.223
	October	0.363	1.010	0.535	0.003	0.206	0.469	2.587	23.809
	November	0.374	1.012	0.595	0.003	0.199	0.460	2.644	26.453
	December	0.412	1.046	0.586	0.003	0.192	0.470	2.708	29.161
	TOTAL	**4.370**	**10.493**	**6.403**	**0.036**	**2.341**	**5.518**	**29.161**	
1974	January	R0.378	R0.830	R0.603	0.003	0.190	R0.447	R2.451	R2.451
	February	R0.354	R0.804	R0.538	0.003	0.188	R0.409	R2.295	R4.746
	March	R0.358	R0.827	R0.519	0.003	0.191	R0.457	R2.355	R7.101
	April	R0.352	R0.662	R0.483	0.003	0.193	R0.445	R2.139	R9.240
	May	R0.342	R0.788	R0.453	0.003	0.196	R0.504	R2.286	R11.526
	June	R0.326	R0.724	R0.458	0.003	0.198	R0.480	R2.189	R13.715
	July	R0.325	R0.806	0.462	0.003	0.198	R0.529	R2.323	R16.037
	August	R0.336	R0.853	R0.473	0.003	0.204	R0.499	R2.368	R18.405
	September	R0.325	R0.933	0.468	0.003	0.206	R0.424	R2.359	R20.765
	October	R0.348	R0.997	R0.537	0.003	0.205	R0.480	R2.570	R23.334
	November	R0.313	R1.001	R0.532	0.003	0.196	R0.473	R2.517	R25.851
	December	R0.309	R0.945	R0.573	0.003	0.184	R0.464	R2.478	R28.329
	TOTAL	**R4.064**	**R10.170**	**R6.100**	**0.036**	**2.348**	**R5.611**	**R28.329**	
1975	January	R0.344	R0.773	R0.591	0.003	0.185	R0.450	R2.346	R2.346
	February	R0.344	R0.630	R0.505	0.003	0.181	R0.394	R2.057	R4.403
	March	R0.365	R0.657	R0.516	0.003	0.181	R0.436	R2.158	R6.562
	April	R0.341	R0.515	R0.461	0.003	0.179	R0.412	R1.912	R8.473
	May	R0.322	R0.529	R0.417	0.003	0.182	R0.458	R1.910	R10.384
	June	R0.304	R0.605	R0.412	0.003	0.185	R0.463	R1.971	R12.354
	July	R0.287	R0.646	R0.439	0.003	0.184	R0.474	R2.034	R14.389
	August	R0.294	R0.734	R0.420	0.003	0.191	R0.480	R2.123	R16.511
	September	R0.294	R0.763	R0.457	0.003	0.194	R0.400	R2.111	R18.622
	October	R0.307	R0.917	R0.507	0.003	0.193	R0.465	R2.392	R21.014
	November	R0.319	R0.865	R0.471	0.003	0.192	R0.463	R2.314	R23.328
	December	R0.338	R0.909	R0.586	0.003	0.189	R0.487	R2.513	R25.841
	TOTAL	**R3.859**	**R8.544**	**R5.782**	**0.036**	**2.237**	**R5.383**	**R25.841**	
1976	January	P0.331	0.600	0.594	0.003	P0.196	P0.484	P2.208	

Energy Consumption (Continued)

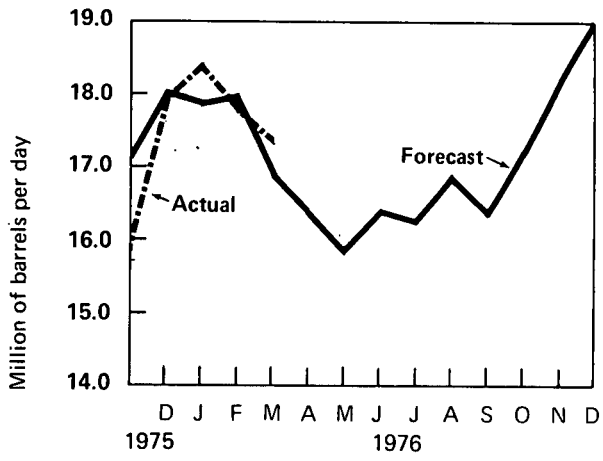
Energy Consumption by the Transportation Economic Sector[1]

		Coal	Natural Gas (dry)[4]	Petroleum	Electricity Distributed	Electrical Energy Loss Distributed	Total Energy Use	Cumulative Total Energy Use
				Quadrillion (10^{15}) Btu				
1973	January	0.001	0.085	1.511	0.005	0.013	1.615	1.615
	February	0.001	0.076	1.417	0.005	0.011	1.510	3.125
	March	0.001	0.070	1.502	0.005	0.012	1.589	4.714
	April	0.001	0.062	1.412	0.005	0.010	1.490	6.204
	May	0.001	0.056	1.540	0.004	0.011	1.612	7.816
	June	0.001	0.046	1.471	0.004	0.011	1.533	9.350
	July	0.001	0.045	1.528	0.004	0.011	1.589	10.939
	August	0.001	0.046	1.588	0.005	0.011	1.651	12.590
	September	0.001	0.047	1.437	0.005	0.010	1.499	14.089
	October	0.001	0.055	1.520	0.005	0.011	1.592	15.681
	November	0.001	0.066	1.523	0.005	0.012	1.607	17.288
	December	0.001	0.078	1.491	0.005	0.013	1.589	18.877
	TOTAL	**0.009**	**0.733**	**17.940**	**0.058**	**0.137**	**18.877**	
1974	January	0.001	0.072	R1.399	0.005	0.013	R1.490	R1.490
	February	0.001	0.066	1.300	0.005	0.011	1.384	R2.874
	March	0.001	0.063	R1.417	0.005	0.012	R1.498	R4.371
	April	0.001	0.051	1.397	0.005	0.011	1.465	R5.836
	May	0.001	0.047	1.484	0.005	0.012	1.547	R7.383
	June	0.001	0.039	R1.448	0.005	0.011	R1.503	R8.886
	July	0.001	0.040	R1.514	0.005	0.012	R1.571	R10.457
	August	0.001	R0.041	R1.533	0.005	0.012	1.590	R12.047
	September	0.001	0.044	R1.393	0.005	0.010	1.452	R13.500
	October	0.001	R0.051	R1.507	0.005	0.012	R1.575	R15.075
	November	0.001	0.057	R1.455	0.005	0.013	R1.531	R16.606
	December	0.001	0.068	1.546	0.006	0.014	1.634	R18.240
	TOTAL	**0.007**	**R0.638**	**R17.392**	**0.060**	**0.143**	**R18.240**	
1975	January	0.001	0.069	R1.498	0.006	0.014	1.587	1.587
	February	0.001	0.063	1.334	0.005	0.012	1.415	3.002
	March	0.001	0.061	1.456	0.005	0.013	1.536	R4.537
	April	0.001	R0.052	R1.455	0.005	0.012	1.524	R6.061
	May	0.001	0.038	R1.480	0.005	0.012	1.536	R7.597
	June	0.001	0.034	1.466	0.005	R0.011	R1.516	R9.113
	July	0.001	0.034	1.498	0.005	R0.012	1.550	R10.663
	August	0.001	0.036	R1.509	0.005	0.012	1.563	R12.226
	September	0.001	0.038	1.420	0.005	0.010	R1.473	R13.699
	October	0.001	0.046	1.495	0.005	0.013	1.560	R15.259
	November	0.001	0.050	R1.379	0.006	R0.013	R1.449	R16.708
	December	0.001	R0.066	R1.556	0.006	0.015	R1.643	R18.351
	TOTAL	**0.007**	**R0.587**	**R17.547**	**0.062**	**R0.149**	**R18.351**	
1976	January	P0.001	0.066	1.564	P0.006	P0.015	P1.651	

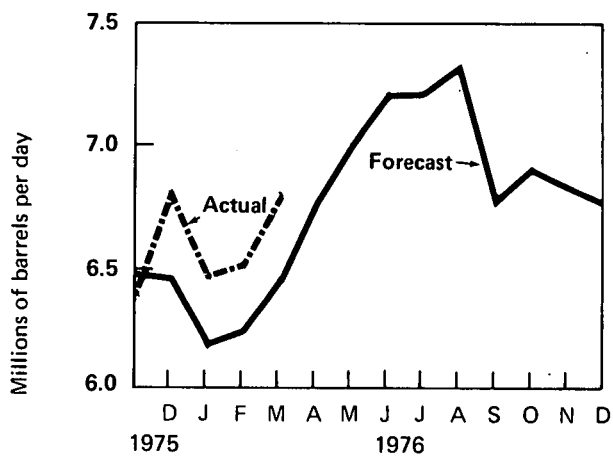
[1] See Explanatory Note 12 for definitions of the Residential and Commercial, Industrial, and Transportation Sectors. The methodology used for sector calculations is provided in the footnotes of the previous table. Printed totals may differ slightly from the sum of their row/column components due to independent rounding.
[2] The percentage share used in calculating Residential and Commercial consumption of petroleum was 52.5 percent for 1973 and 52.3 percent for 1974 and 1975.
[3] The percentage share used in calculating Industrial consumption of petroleum was 47.5 percent for 1973 and 47.7 percent for 1974 and 1975.
[4] The percentage share used in calculating Transportation consumption of natural gas was 3.9 percent for 1973 and 3.5 percent for 1974 and 1975.
R=Revised data. P=Preliminary.

Petroleum Consumption and Forecast

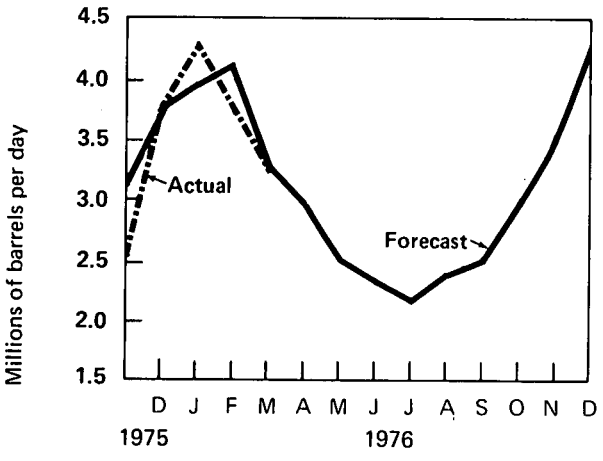
Total Domestic Demand for Petroleum Products



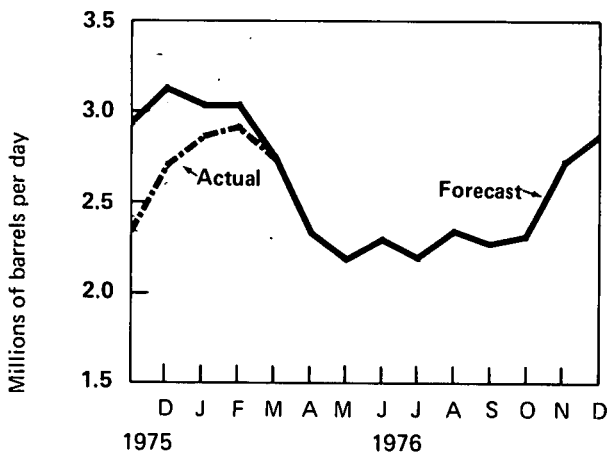
Domestic Demand for Motor Gasoline



Domestic Demand for Distillate Fuel Oil



Domestic Demand for Residual Fuel Oil



Notes:

Domestic Demand – Demand for products, in terms of real consumption, is not available; production plus imports plus withdrawals from primary stocks is used as a proxy for consumption. Secondary stocks, not measured by FEA, are substantial for some products.

Actuals – Based on BOM data for December and API data for January through March.

Forecast – See Explanatory Note 13 for discussion of basic assumptions of forecast.

Part 8

Resource Development

OIL AND GAS EXPLORATION

A total of 3,848 wells were drilled during March 1976, an increase of 24.5 percent over the number drilled during March 1975. Rotary drilling rig activity, however, continued to decline during the month. The March rig count averaged 1,540, down 54 rigs from the count for February, and down 253 rigs from the high of last December. Although early in the year a seasonal decline is normal, the March rig count was 6.7 percent below the count for the same month a year ago.

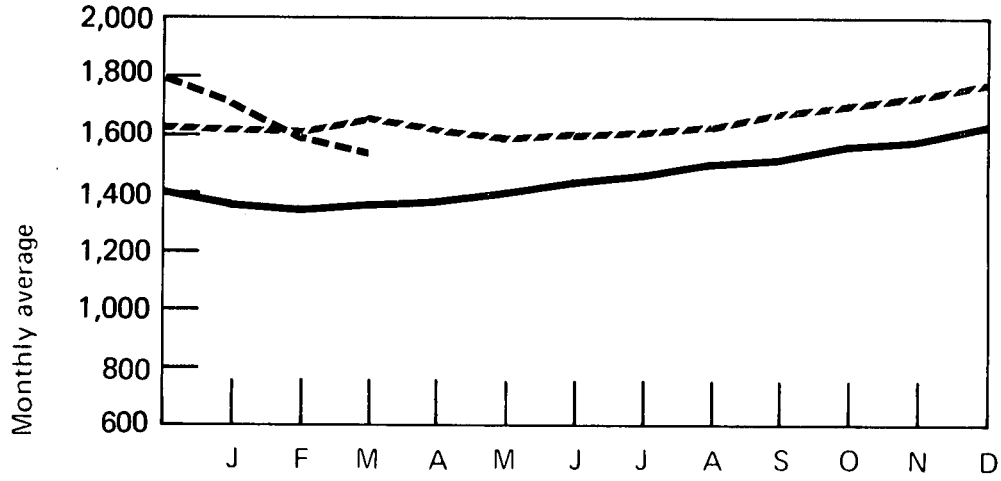
Seismic exploration activity declined for the seventh consecutive month in March. There were 240 crews at work in the United States and its territorial waters during March, 9 less than during the previous month.

Oil and Gas Exploration

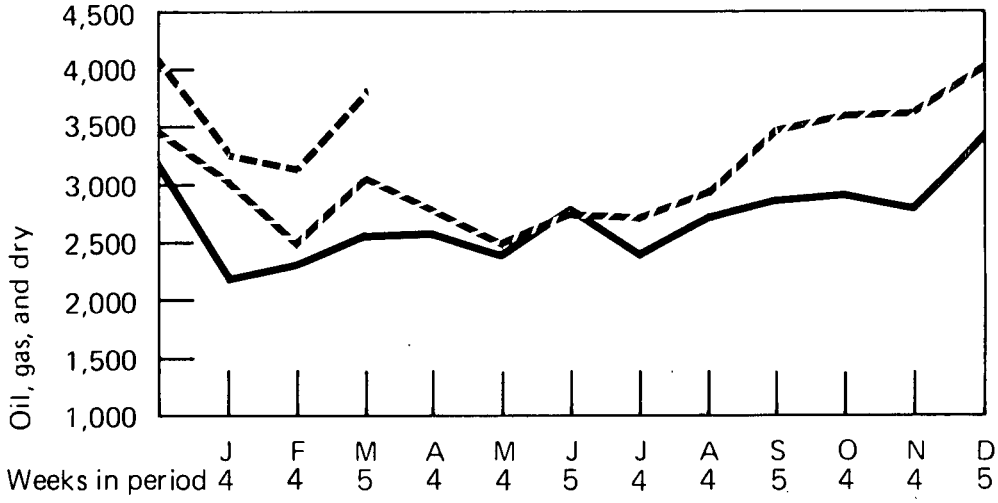
		Rotary Rigs in Operation		Wells Drilled				Total Footage of Wells Drilled
		Monthly average		Oil	Gas	Dry	Total	Thousands of feet
1973	January	1,219		758	406	899	2,063	10,973
	February	1,126		777	487	765	2,029	10,656
	March	1,049		953	504	909	2,366	12,318
	April	993		699	489	777	1,965	10,434
	May	1,046		749	407	647	1,803	9,622
	June	1,118		767	432	795	1,994	10,815
	July	1,155		912	504	840	2,256	10,996
	August	1,222		724	456	739	1,919	9,633
	September	1,266		854	690	940	2,484	12,075
	October	1,334		790	554	958	2,302	11,694
	November	1,390		822	606	865	2,293	11,823
	December	1,405		1,087	827	1,208	3,122	15,530
	AVERAGE	**1,194**	**TOTAL***	**9,902**	**6,385**	**10,305**	**26,592**	**136,391**
1974	January	1,372		763	577	803	2,143	10,392
	February	1,355		901	600	816	2,317	12,160
	March	1,367		936	638	1,003	2,577	12,844
	April	1,381		947	700	945	2,592	13,349
	May	1,412		957	520	870	2,347	11,460
	June	1,432		1,238	586	982	2,806	12,976
	July	1,480		1,008	461	884	2,353	11,802
	August	1,518		1,210	555	968	2,733	12,410
	September	1,527		1,200	600	1,091	2,891	12,676
	October	1,584		1,131	551	1,241	2,923	14,081
	November	1,596		1,088	626	1,053	2,767	11,795
	December	1,643		1,339	791	1,274	3,404	15,707
	AVERAGE	**1,475**	**TOTAL***	**12,784**	**7,240**	**11,674**	**31,698**	**150,551**
1975	January	1,615		1,299	655	1,040	2,994	13,189
	February	1,611		1,097	458	933	2,488	12,071
	March	1,651		1,341	658	1,091	3,090	15,472
	April	1,604		1,181	506	1,071	2,758	13,545
	May	1,592		1,100	451	891	2,442	12,054
	June	1,613		1,246	509	1,022	2,777	13,540
	July	1,616		1,229	557	920	2,706	12,545
	August	1,645		1,272	587	1,122	2,981	14,221
	September	1,699		1,504	831	1,165	3,500	15,636
	October	1,716		1,633	682	1,310	3,625	16,689
	November	1,757		1,619	776	1,270	3,665	15,788
	December	1,793		1,817	832	1,424	4,073	17,556
	AVERAGE	**1,662**	**TOTAL***	**16,336**	**7,505**	**13,251**	**37,092**	**172,284**
1976	January	1,710		1,465	772	1,055	3,292	14,517
	February	1,594		1,341	652	1,159	3,152	14,888
	March	1,540		1,726	821	1,301	3,848	18,126
	AVERAGE (3 months)	**1,609**	**TOTAL*** (3 months)	**4,532**	**2,245**	**3,515**	**10,292**	**47,531**

*Totals reflect subsequent data revisions and therefore may not agree with cumulative monthly data.
Sources: Rotary Rigs - Hughes Tool Company; Wells - American Petroleum Institute.

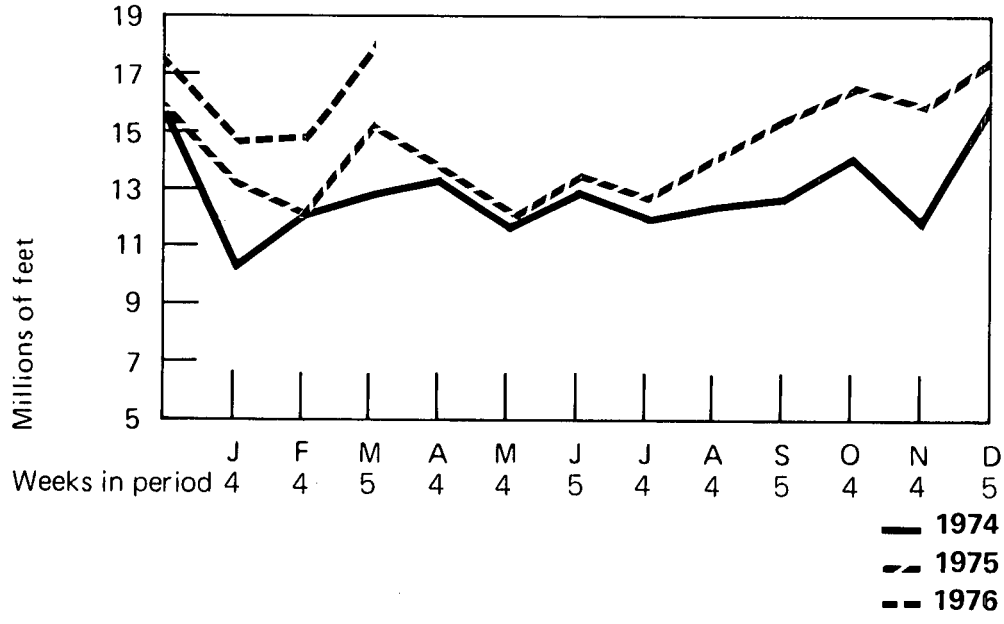
Rotary Rigs in Operation



Total Wells Drilled



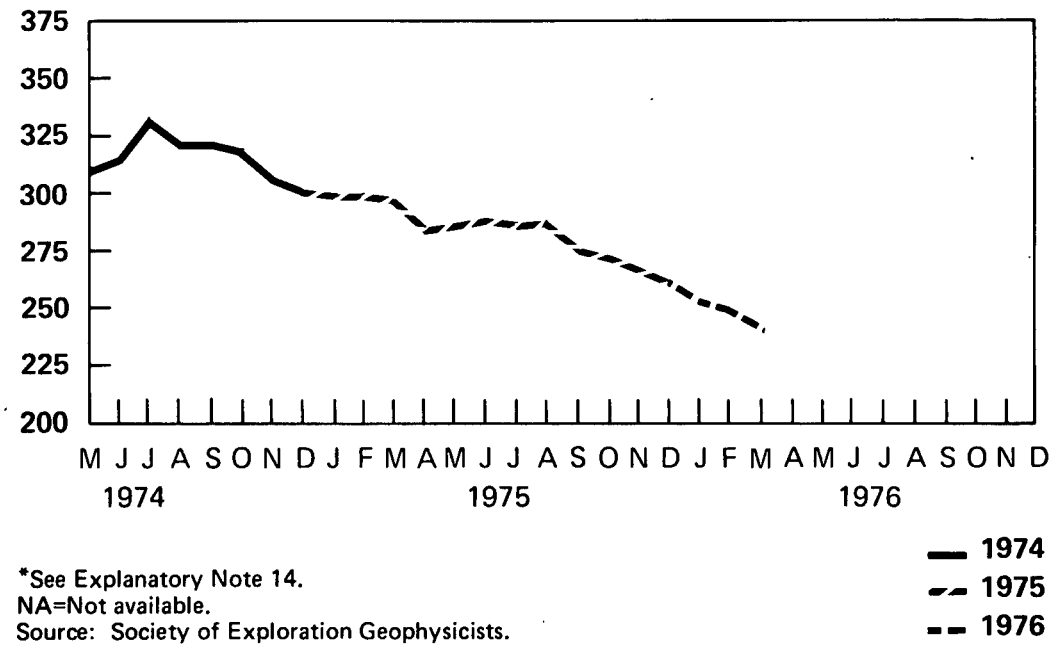
Total Footage of Wells Drilled



Oil and Gas Exploration (Continued)

	Crews Engaged in Seismic Exploration			Line Miles of Seismic Exploration		
	Offshore	Onshore	Total	Offshore	Onshore	Total
1972 Monthly Average	12	239	251	10,306	9,333	19,639
1973 Monthly Average	23	227	250	21,579	10,597	32,175
1974 Monthly Average	31	274	305	28,482	13,219	41,701
1975 Monthly Average	30	253	283	*27,360	*12,206	*39,566
1974 January-April	NA	NA	NA			
May	35	278	313			
June	38	279	317			
July	35	299	334			
August	34	287	321			
September	34	287	321			
October	32	288	320			
November	30	276	306			
December	25	275	300			
1975 January	27	274	301			
February	24	278	302			
March	23	276	299			
April	23	260	283			
May	32	254	286			
June	38	251	289			
July	37	249	286			
August	40	249	289			
September	40	234	274			
October	29	241	270			
November	27	238	265			
December	26	233	259			
1976 January	20	232	252			
February	17	232	249			
March	18	222	240			
AVERAGE (3 months)	18	229	247			

Total Seismic Crews



*See Explanatory Note 14.
NA=Not available.
Source: Society of Exploration Geophysicists.

MOTOR GASOLINE

The national average selling price for regular gasoline at full service retail outlets declined 0.5 cent in March to 56.6 cents per gallon. This was the sixth consecutive monthly decrease since October 1975. The average price that retailers paid for regular gasoline decreased by the same amount in March leaving the dealer margin unchanged at 8.3 cents per gallon.

CRUDE OIL

A preliminary estimate of the average "upper tier" crude oil price during February is $11.33 per barrel, $1.66 below the "new oil" price in January. This decrease can be attributed to the "new oil" price rollback legislated in the Energy Policy and Conservation Act of 1975. "Upper tier" ceiling price is computed to be the highest posted price for the same grade of crude oil in the same or nearest field on September 30, 1975, less $1.32 per barrel.

UTILITY FOSSIL FUELS

The national average cost of fossil fuels delivered to utilities during December 1975 was 106.9 cents per million Btu, 4.5 cents above the cost for November. The Pacific Coast region experienced the largest fuel cost increase (16.3 cents per million Btu)—the result of a shift from gas to oil, which normally occurs during the residential heating season.

The national average cost of coal remained relatively stable, with only a 0.5 cent per million Btu increase in December. The contract price for coal rose slightly to $16.90 per ton in December, but the spot price declined slightly to $22.40 per ton.

The average cost of residual fuel declined by 2.4 cents per million Btu as a result of decreasing spot and contract prices.

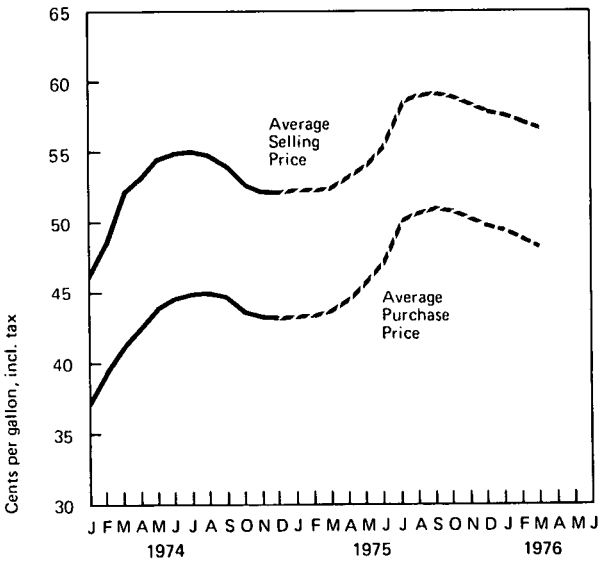
The average cost of natural gas delivered to utilities resumed its upward trend during December by increasing 2.6 cents to 86.1 cents per million Btu.

Motor Gasoline

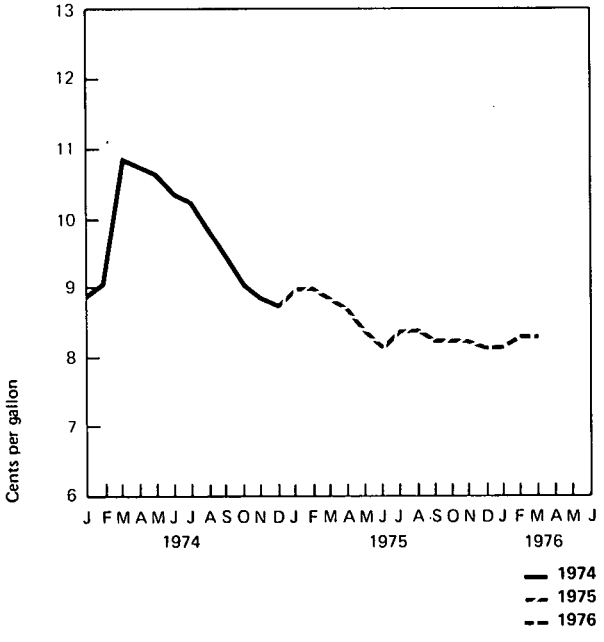
Regular Gasoline at Full Service Retail Outlets

		Average Selling Price	Average Purchase Price	Average Dealer Margin
		Cents per gallon, including tax*		
1973	January	37.3	30.5	6.8
	February	36.8	30.1	6.7
	March	37.9	30.8	7.1
	April	38.3	31.0	7.3
	May	38.5	31.2	7.3
	June	38.8	31.2	7.6
	July	38.8	31.2	7.6
	August	38.8	31.2	7.6
	September	38.7	31.1	7.6
	October	39.7	32.2	7.5
	November	41.3	33.6	7.7
	December	43.3	35.1	8.2
	AVERAGE	**39.0**	**31.6**	
1974	January	46.3	37.4	8.9
	February	48.8	39.7	9.1
	March	52.3	41.4	10.9
	April	53.4	42.7	10.7
	May	54.7	44.1	10.6
	June	55.1	44.8	10.3
	July	55.2	45.0	10.2
	August	54.9	45.1	9.8
	September	54.2	44.8	9.4
	October	52.4	43.4	9.0
	November	52.0	43.2	8.8
	December	52.0	43.3	8.7
	AVERAGE	**52.8**	**43.1**	
1975	January	52.4	43.4	9.0
	February	52.5	43.5	9.0
	March	52.6	43.8	8.8
	April	53.5	44.9	8.6
	May	54.3	46.0	8.3
	June	55.6	47.5	8.1
	July	58.7	50.3	8.4
	August	59.2	50.8	8.4
	September	59.3	51.1	8.2
	October	58.9	50.7	8.2
	November	58.4	50.2	8.2
	December	58.0	49.9	8.1
	AVERAGE	**56.2**	**47.8**	
1976	January	57.7	49.6	8.1
	February	57.1	48.8	8.3
	March	56.6	48.3	8.3

Average Retail Prices For Regular



Average Margins For Regular



*To derive prices excluding taxes, 12.0 cents per gallon may be deducted for 1973, 12.2 cents per gallon may be deducted for 1974 and 1975, and 12.5 may be deducted for 1976.

Sources: *Platts Oilgram* through September 1973; FEA from October 1973 through December 1974; Lundberg Survey, Inc., from January 1975 forward.

Average Selling Prices at Major and Independent Retail Dealers – March 1976

	Cents per gallon, including tax		Cents per gallon, including tax
Regular Gasoline-Full Service		**Regular Gasoline-Self Service**	
Major	57.4	Major	54.1
Independent	52.3	Independent	51.0
National Average	56.6	**National Average**	53.2
Premium Gasoline-Full Service		**Premium Gasoline-Self Service**	
Major	62.3	Major	59.5
Independent	56.7	Independent	55.4
National Average	61.6	**National Average**	58.4
Diesel Fuel-Truck Stops*		**Diesel Fuel-Service Stations***	
Major	52.8	Major	54.1
Independent	50.2	Independent	51.1
National Average	51.4	**National Average**	52.4

*See Explanatory Note 15.
Source: Lundberg Survey, Inc.

Average Margins for Major and Independent Retail Dealers – March 1976

	Cents per gallon		Cents per gallon
Regular Gasoline-Full Service		**Regular Gasoline-Self Service**	
Major	8.6	Major	5.2
Independent	6.6	Independent	5.3
National Average	8.3	**National Average**	5.3
Diesel Fuel-Truck Stops*		**Diesel Fuel-Service Stations***	
Major	5.2	Major	6.3
Independent	6.4	Independent	7.8
National Average	5.6	**National Average**	7.1

*See Explanatory Note 15.
Source: Lundberg Survey, Inc.

Average Regional Retail Selling Prices and Dealer Margins for Regular Gasoline at Full Service Retail Outlets – March 1976

FEA Region	Selling Price	Margin
	Cents per gallon, including tax	
1A New England	56.4	8.5
1B Mid Atlantic	57.5	7.4
1C Lower Atlantic	57.4	8.8
2 Mid Continent	56.4	7.8
3 Gulf Coast	54.0	9.4
4 Rock Mountain	57.5	10.0
5 West Coast	57.8	8.6
NATIONAL AVERAGE	**56.6**	**8.3**

Source: Lundberg Survey, Inc.

Motor Gasoline (Continued)

Retail Gasoline Price Changes for 21 Leading Refiners During March 1976 and Entitlement Position* During February 1976

Company	Effective Date of Change	Amount of Change	Entitlement Position (February)
		Cents per gallon	
Amerada Hess	March 5	-1.00	Seller
American Petrofina		None	Buyer
Ashland	March 10	-0.50 Pittsburgh	Seller
		-0.75 Cleveland	
		-1.00 Atl., Balt., Buff., Chic.	
	March 24	-0.25 Atlanta	
		-0.05 Buff., Chic.	
Atlantic Richfield		None	Seller
B.P.	March 2	-2.00	Seller
Cities Service		None	Buyer
Champlin		None	Buyer
Continental		None	Buyer
Exxon	March 2	-1.00	Buyer
Getty		None	Buyer
Gulf	March 12	-1.00 (leaded, unleaded)	Buyer
Kerr-McGee		None	Buyer
Mobil	March 9	1.00	Buyer
Phillips		None	Seller
Shell	March 6	-1.00	Buyer
Standard Oil of California	March 13	-1.00	Seller
Standard Oil of Indiana	March 11	-1.00	Buyer
Standard Oil of Ohio	March 2	-2.00	Seller
Sun	March 13, 26	-0.90 (DTW), 1.00	Buyer
Texaco	March 1	1.00	Seller
Union Oil of California	March 15	-1.00	Buyer

*See definitions.
Source: FEA.

Jobber Prices for Regular Gasoline Sold by 21 Leading Refiners

		Northeast	Mid-Atlantic	Southeast	Central	Western	Southwest	Pacific	National Average
		Cents per gallon, excluding tax							
1974	January	21.4	21.4	21.1	21.3	22.2	20.1	21.0	21.2
	February	23.7	23.6	22.5	23.9	23.5	22.5	22.6	23.2
	March	25.4	25.2	24.1	25.3	24.5	24.2	25.2	24.8
	April	26.7	26.1	24.8	26.0	25.6	24.7	25.0	25.6
	May	28.5	28.4	26.8	28.2	27.7	26.3	26.3	27.5
	June	29.8	29.4	28.0	29.3	29.3	27.1	27.2	28.6
	July	29.9	29.3	28.0	29.4	28.9	27.8	28.0	28.8
	August	29.7	29.4	28.6	29.6	29.1	28.1	28.6	29.0
	September	29.3	28.9	28.0	28.8	28.7	27.4	27.8	28.4
	October	28.0	27.2	26.6	27.5	27.0	26.2	26.6	27.0
	November	27.8	27.3	26.6	27.5	27.5	26.3	27.3	27.2
	December	27.7	27.6	26.9	27.7	27.9	26.7	27.3	27.4
	AVERAGE								**26.7**
1975	January	27.8	27.8	27.4	28.2	28.5	27.2	27.8	27.8
	February	28.4	28.2	27.8	28.7	28.3	27.6	27.5	28.1
	March	28.9	28.8	28.4	29.1	29.0	27.8	28.0	28.6
	April	29.6	29.9	29.4	30.4	29.8	29.2	29.8	29.7
	May	30.9	31.0	30.5	31.6	31.2	30.4	31.0	30.9
	June	32.4	32.5	32.0	33.1	32.6	31.6	32.6	32.4
	July	34.4	34.6	33.9	34.9	34.5	33.4	33.7	34.2
	August	35.3	35.1	34.6	35.6	35.2	34.1	34.5	34.9
	September	35.2	35.1	34.5	35.4	35.0	34.1	34.5	34.8
	October	34.3	34.6	34.0	34.9	34.3	33.8	34.2	34.3
	November	34.1	34.3	33.9	34.6	34.3	33.6	34.0	34.1
	December	33.7	34.1	33.6	34.3	33.8	33.3	33.7	33.8
	AVERAGE								**32.0**
1976	January	33.3	33.9	33.2	34.0	33.2	33.1	33.5	33.5
	February	33.0	33.4	32.6	33.8	32.6	32.9	33.5	33.1
	March	32.4	33.0	31.8	33.4	32.5	32.6	33.2	32.7

Source: FEA.

Heating Oil

Retail Heating Oil Price Changes for 21 Leading Refiners During March 1976

Company	Effective Date	Amount of Change
		Cents per gallon
Amerada Hess	March 1	4.00
American Petrofina	March 20	-1.00
Ashland	March 1	-1.50
Atlantic Richfield		None
B.P.	March 2	-1.00
Cities Service		None
Champlin		None
Continental		None
Exxon	March 2	-1.00
Getty	March 1	2.00
Gulf		None
Kerr-McGee	March 3, 19	-1.00, -0.75
Mobil	March 9	1.00
Phillips	March 15	-1.50
Shell	March 6	1.10
Standard Oil of California	March 13	-0.50
Standard Oil of Indiana		None
Standard Oil of Ohio	March 2	-1.00
Sun		None
Texaco*	March 1	-1.00 East Coast
	March 25	-0.95 East Coast; -1.50 Midwest, West Coast
Union Oil of California		None

*Price changes are for retailers and resellers only.
Source: FEA.

Residential Heating Oil Prices

		Average Selling Price	Average Purchase Price	Average Dealer Margin
		Cents per gallon		
1974	January	31.1	23.4	7.7
	February	32.8	25.4	7.4
	March	33.8	25.9	7.9
	April	34.0	25.9	8.1
	May	35.1	26.8	8.3
	June	35.3	27.5	7.8
	July	35.2	28.1	7.1
	August	35.8	28.1	7.7
	September	36.3	28.7	7.6
	October	35.6	28.9	6.7
	November	37.9	29.1	8.8
	December	36.9	28.5	8.4
	AVERAGE	**34.7**	**26.9**	
1975	January	37.4	29.1	8.3
	February	37.0	28.7	8.3
	March	36.6	28.4	8.2
	April	36.1	29.3	6.8
	May	36.7	30.0	6.7
	June	36.1	30.3	5.8
	July	37.2	30.6	6.6
	August	38.0	31.2	6.8
	September	38.4	31.0	7.4
	October	39.3	31.8	7.5
	November	39.4	32.1	7.3
	December	40.1	32.4	7.7
	AVERAGE	**37.7**	**31.2**	
1976	January	40.1	32.4	7.7
	February	40.1	32.4	7.7

Source: FEA.

Residential Heating Oil Prices by Region

		New England	Mid Atlantic	Southeast	East North Central	East South Central	West North Central	West South Central	Mountain	West Coast
					Cents per gallon					
1974	January	31.9	31.6	30.8	30.3	29.8	31.3	NA	30.4	30.5
	February	33.8	33.5	32.8	30.9	32.0	32.9	NA	37.2	32.8
	March	31.9	33.7	33.9	34.2	30.6	34.5	NA	NA	NA
	April	34.3	34.8	32.5	33.5	33.7	30.1	NA	34.2	32.6
	May	34.8	35.6	36.2	34.2	34.4	32.6	NA	34.8	37.8
	June	35.9	36.2	35.8	34.9	31.1	33.6	NA	35.9	39.1
	July	35.2	35.5	35.6	34.4	30.2	34.9	NA	36.1	36.3
	August	36.3	36.1	37.8	35.1	33.7	35.2	NA	NA	35.9
	September	37.2	36.5	36.1	35.0	33.6	35.8	NA	32.3	35.1
	October	36.7	35.9	36.9	33.3	34.1	33.8	NA	35.6	36.3
	November	39.0	38.7	37.4	36.4	35.3	35.6	NA	37.3	36.4
	December	38.3	38.7	36.8	34.2	34.7	33.5	NA	35.8	33.9
1975	January	40.2	38.9	36.5	33.2	34.7	34.0	NA	37.5	38.0
	February	39.2	38.4	36.8	33.4	34.7	33.3	NA	36.6	37.7
	March	38.0	37.8	36.4	34.2	33.2	34.3	NA	NA	36.8
	April	37.4	36.8	36.8	33.2	33.7	34.5	NA	38.9	36.8
	May	37.6	36.9	36.4	35.1	34.7	35.4	NA	37.0	37.8
	June	37.7	37.7	36.4	35.8	NA	35.9	NA	37.6	37.6
	July	37.9	36.9	36.9	36.4	34.7	36.8	NA	NA	38.8
	August	38.8	38.2	37.9	36.3	35.7	36.3	NA	41.3	39.3
	September	39.4	38.7	37.6	36.5	35.7	36.8	NA	38.9	40.1
	October	40.3	39.9	38.3	37.4	36.6	37.9	NA	39.0	41.0
	November	41.0	39.6	38.7	37.9	NA	38.1	NA	40.2	41.3
	December	41.0	41.1	39.0	38.5	34.1	38.0	NA	44.8	40.9
1976	January	41.3	40.6	39.9	38.6	NA	39.0	NA	40.2	42.0
	February	41.1	41.6	39.2	38.5	37.2	38.9	NA	NA	40.8

NA=Not available.
Source: FEA.

Average Distributor Purchase Prices for Heating Oil by Region

		New England	Mid Atlantic	Southeast	East North Central	East South Central	West North Central	West South Central	Mountain	West Coast
					Cents per gallon					
1974	January	22.3	23.4	23.3	23.8	23.5	24.0	NA	22.5	23.0
	February	24.9	25.5	25.3	24.8	25.2	26.4	NA	29.7	25.3
	March	24.9	25.0	26.3	25.6	24.0	27.0	NA	NA	NA
	April	25.7	26.0	26.0	27.1	26.3	24.0	NA	26.8	26.0
	May	26.3	27.0	27.5	27.3	27.4	25.8	NA	27.1	26.2
	June	27.5	27.6	27.8	29.0	25.4	27.4	NA	27.3	28.0
	July	28.1	28.2	28.3	27.5	25.2	28.5	NA	28.2	29.1
	August	28.1	28.2	27.9	27.5	29.3	28.8	NA	NA	28.2
	September	29.2	28.9	28.5	27.8	28.2	28.4	NA	29.3	28.8
	October	29.9	29.4	28.8	27.7	28.3	27.4	NA	29.9	29.2
	November	29.8	29.7	28.8	27.8	29.1	27.6	NA	27.9	29.8
	December	29.3	29.4	28.4	27.4	28.8	26.7	NA	29.3	27.0
1975	January	30.3	29.7	28.5	27.2	28.8	27.5	NA	28.5	29.7
	February	29.6	29.3	28.6	27.2	28.8	27.3	NA	29.4	28.5
	March	29.5	29.3	29.1	28.1	26.8	28.1	NA	NA	27.6
	April	29.4	29.5	29.7	28.3	27.8	29.5	NA	29.0	28.5
	May	30.5	30.0	30.0	30.0	28.8	29.4	NA	30.9	28.7
	June	30.4	30.2	30.6	30.5	NA	30.7	NA	31.8	29.0
	July	30.7	30.1	29.9	31.6	28.8	31.4	NA	NA	30.4
	August	31.6	30.8	30.9	31.2	29.8	30.2	NA	31.6	32.8
	September	31.4	30.9	30.7	30.6	29.8	30.6	NA	31.9	31.4
	October	32.0	31.9	31.3	31.5	31.1	31.4	NA	34.4	32.5
	November	32.5	31.7	32.0	32.1	NA	32.0	NA	34.1	32.3
	December	32.9	32.7	31.8	32.0	29.4	31.4	NA	33.9	32.8
1976	January	32.5	32.5	31.9	32.3	NA	32.3	NA	33.6	32.9
	February	32.8	39.9	31.6	31.9	31.3	32.1	NA	NA	31.1

NA=Not available.
Source: FEA.

Crude Oil

Domestic Crude Petroleum Prices at the Wellhead*

		Old	New
		Dollars per barrel	
1974	January	5.25	9.82
	February	5.25	9.87
	March	5.25	9.88
	April	5.25	9.88
	May	5.25	9.88
	June	5.25	9.95
	July	5.25	9.95
	August	5.25	9.98
	September	5.25	10.10
	October	5.25	10.74
	November	5.25	10.90
	December	5.25	11.08
	AVG.	5.25	10.13
1975	January	5.25	11.28
	February	5.25	11.39
	March	5.25	11.47
	April	5.25	11.64
	May	5.25	11.69
	June	5.25	11.73
	July	5.25	12.30
	August	5.25	12.38
	September	5.25	12.46
	October	5.25	12.73
	November	5.25	12.89
	December	5.25	12.95
1976	January	5.25	12.99
		Lower Tier**	Upper Tier**
	February	5.25	***11.33

**See definitions.
***Preliminary figure based on early reports.
Source: FEA.

Refiner Acquisition Cost of Crude Petroleum*

		Domestic**	Imported	Composite
		Dollars per barrel		
1974	January	6.72	9.59	7.46
	February	7.08	12.45	8.57
	March	7.05	12.73	8.68
	April	7.21	12.72	9.13
	May	7.26	13.02	9.44
	June	7.20	13.06	9.45
	July	7.19	12.75	9.30
	August	7.20	12.68	9.17
	September	7.18	12.53	9.13
	October	7.26	12.44	9.22
	November	7.46	12.53	9.41
	December	7.39	12.82	9.28
	AVERAGE	**7.18**	**12.52**	**9.07**
1975	January	7.78	12.77	9.48
	February	8.29	13.05	10.09
	March	8.38	13.28	9.91
	April	8.23	13.26	9.83
	May	8.33	13.27	9.79
	June	8.33	14.15	10.33
	July	8.37	14.03	10.57
	August	8.48	14.25	10.81
	September	8.49	14.04	10.79
	October	8.68	14.66	10.85
	November	8.67	15.04	11.05
	December	8.66	14.81	10.98
	AVERAGE	**8.39**	**13.93**	**10.38**
1976	January	***9.12	***13.27	***10.76

*See Explanatory Note 17.
**See Explanatory Note 16.
***Preliminary data.
Source: FEA.

Entitlement Prices*

		Dollars
1974	November	5.00
	December	5.00
1975	January	6.00
	February	6.75
	March	7.31
	April	7.29
	May	7.39
	June	7.82
	July	8.13
	August	8.31
	September	8.31
	October	8.62
	November	8.94
	December	8.55
1976	January	8.09
	February	7.85

*See definitions.
Source: FEA.

Crude Oil (Continued)

Estimated Landed Cost of Imported Crude Petroleum From Selected Countries*

		Algeria	Canada	Indonesia	Iran	Nigeria	Saudi Arabia	U. A. Emirates	Venezuela
					Dollars per barrel				
1974	January	NA	6.70	NA	8.53	12.13	NA	NA	10.28
	February	NA	10.90	NA	12.11	12.74	NA	NA	11.31
	March	NA	11.14	12.13	13.02	13.26	NA	NA	11.78
	April	13.63	11.02	12.49	12.83	13.67	11.59	NA	11.38
	May	14.67	11.47	12.95	13.84	13.83	11.53	NA	11.28
	June	14.43	12.56	13.21	13.44	13.03	11.32	13.06	10.39
	July	13.65	12.65	13.77	13.02	12.75	11.97	12.34	10.64
	August	13.96	12.49	14.38	12.31	12.70	12.16	12.69	11.20
	September	13.83	12.51	13.42	11.87	12.28	11.45	NA	11.01
	October	13.20	12.53	14.24	12.07	12.12	11.51	12.84	10.95
	November	13.43	12.33	13.45	12.15	12.83	12.15	13.54	11.15
	December	13.08	12.15	14.15	11.63	12.88	11.75	14.59	11.37
1975	January	12.72	12.43	13.30	12.11	12.07	12.07	13.14	11.37
	February	12.11	12.15	13.52	11.86	12.18	11.94	12.67	11.56
	March	12.46	12.79	13.94	12.08	12.56	11.78	13.40	11.66
	April	12.36	12.95	13.71	12.34	12.46	12.16	12.55	11.61
	May	12.41	12.08	13.71	11.93	12.34	12.27	13.29	11.54
	June	12.37	11.90	13.73	12.51	12.49	11.93	12.48	11.51
	July	12.69	12.15	13.98	11.83	12.37	12.08	12.78	11.46
	August	12.68	12.27	13.85	12.17	12.32	12.10	12.60	11.44
	September	12.52	12.63	13.75	11.97	12.42	12.17	12.49	11.42
	October	13.45	13.02	14.00	12.27	13.18	12.64	12.85	12.08
	November	13.28	14.00	13.81	12.47	13.37	12.58	13.23	12.38
	December	13.46	13.96	13.92	13.01	13.57	12.93	13.21	12.31
1976	January	13.56	12.95	13.89	13.01	13.61	13.18	13.50	11.60
	February	**13.57	**13.24	**13.94	**12.87	**13.52	**13.21	**13.36	**12.09

*See Explanatory Note 17.
**Preliminary data.
Source: FEA.

Unrecouped Costs for Refined Products for 30 Largest Refiners

		Distillate	Motor Gasoline	Aviation Jet Fuel*	Other Products	Total
				Millions of dollars		
1974	January	116	91		43	250
	February	184	87		175	446
	March	198	85		237	520
	April	223	215		346	783
	May	261	255		446	963
	June	326	394		630	1,350
	July	355	325		648	1,327
	August	392	349		665	1,405
	September	409	431		650	1,490
	October	295	424		531	1,250
	November	245	475		595	1,315
	December	209	413		492	1,114
1975	January	254	431		672	1,357
	February	300	418		790	1,508
	March	282	452		966	1,700
	April	302	485		807	1,594
	May	292	370		771	1,433
	June	284	266		785	1,334
	July	233	219		624	1,075
	August	280	344		583	1,208
	September	347	335		661	1,342
	October	338	245		673	1,255
	November	426	275		796	1,497
	December	446	211		826	1,483
1976	January	336	242	131	515	1,224

*Prior to January 1976 refiners were not required to maintain separate banks for aviation jet fuel.
Source: FEA.

Natural Gas

Natural Gas Prices Reported by Major Interstate Pipeline Companies

		PURCHASES			SALES		
		From Domestic Producers	From Canadian and Mexican Sources	Total Purchases	To Industrial Users*	To Resellers**	Total Sales
		Cents per thousand cubic feet					
1974	January	24.3	42.7	25.7	48.1	55.0	55.1
	February	25.4	43.2	26.8	49.8	56.4	56.4
	March	25.7	43.2	27.0	50.8	56.9	56.9
	April	25.8	46.4	27.4	49.3	57.6	57.4
	May	25.7	49.3	27.5	49.9	58.6	57.9
	June	26.0	47.7	27.5	50.8	59.4	58.5
	July	26.3	58.7	28.6	52.5	62.0	61.1
	August	26.1	57.5	28.4	55.2	64.4	63.5
	September	27.3	58.8	29.5	54.7	65.2	64.3
	October	27.5	58.9	29.9	56.3	64.4	64.0
	November	28.5	70.9	31.7	58.7	66.8	66.6
	December	32.6	74.5	35.8	60.3	67.2	67.4
1975	January	29.8	104.0	35.2	67.6	71.1	71.4
	February	29.5	105.8	35.2	70.1	74.1	74.4
	March	31.6	102.5	37.0	70.4	77.8	77.9
	April	32.9	102.8	38.3	71.1	82.3	81.9
	May	34.7	100.6	39.8	71.1	83.7	82.8
	June	35.3	98.3	40.2	72.2	85.2	84.0
	July	36.9	101.1	41.8	73.9	84.7	83.6
	August	35.5	141.0	43.3	73.4	85.6	84.3
	September	36.5	141.2	44.5	72.8	85.9	84.6
	October	36.1	140.1	44.3	77.2	86.1	85.6
	November	36.5	162.5	46.7	77.8	86.9	86.6
	December	35.9	161.8	46.0	81.1	79.6	80.1
1976	January	38.6	164.0	48.6	87.5	88.7	89.2

*Represents direct sales by pipelines to industrial users. Does not include sales to industrial users by resellers.
**Includes the cost of gas to the distributing utility at entrance of distribution system or point of receipt.
Source: Federal Power Commission.

Average Retail Prices for Natural Gas Sold to Residential Customers for Heating Use

		Price
		Cents per thousand cubic feet
1974	January	113.3
	February	115.2
	March	116.9
	April	118.2
	May	119.9
	June	120.3
	July	122.0
	August	124.2
	September	125.6
	October	127.4
	November	131.4
	December	134.2
1975	January	137.9
	February	141.3
	March	142.7
	April	147.1
	May	150.1
	June	152.1
	July	151.1
	August	151.8
	September	155.7
	October	156.3
	November	162.3
	December	166.2
1976	January	167.4
	February	171.1
	March	172.9

Source: Bureau of Labor Statistics.

Utility Fossil Fuels

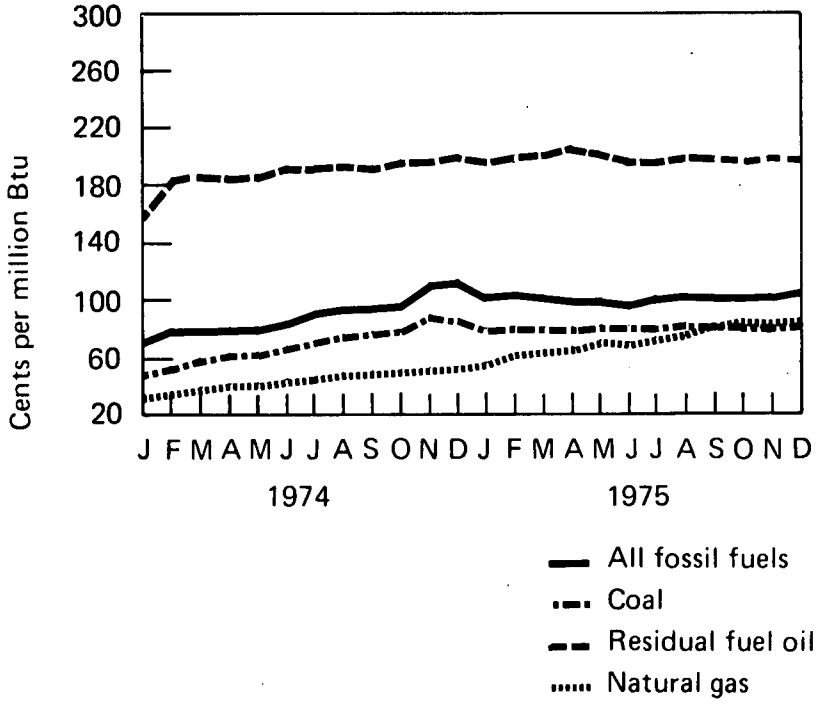
COST OF FOSSIL FUELS DELIVERED TO STEAM-ELECTRIC UTILITY PLANTS

All Fossil Fuels*

Cents per million Btu	1974	1975										
Region	DEC	JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC
New England	196.6	193.6	198.8	192.2	196.3	190.5	192.7	189.5	188.0	182.9	182.3	181.2	177.6
Middle Atlantic	181.6	145.2	147.1	141.3	138.3	138.5	140.4	154.5	144.5	132.7	133.7	140.8	140.8
East North Central	100.9	86.6	85.6	86.9	86.6	87.4	87.5	89.2	90.1	88.2	87.0	89.5	92.6
West North Central	63.3	63.5	69.0	85.5	64.5	60.3	62.8	63.0	62.7	63.9	62.6	62.5	65.7
South Atlantic	144.2	125.1	120.2	120.4	120.4	120.1	122.5	126.8	125.2	124.4	118.4	117.0	121.3
East South Central	86.4	79.4	83.1	83.0	83.0	84.8	85.3	86.2	84.5	85.2	83.8	84.5	85.5
West South Central	57.5	59.8	67.4	68.9	70.0	72.9	71.2	76.0	77.5	79.1	79.6	77.0	82.8
Mountain	46.8	54.6	62.9	54.5	51.7	52.1	50.9	51.8	50.4	55.0	50.1	52.3	55.6
Pacific	191.3	190.0	194.4	196.3	209.7	187.3	154.5	147.1	171.3	174.5	177.2	206.6	222.9
NATIONAL AVG.	**114.7**	**104.3**	**106.4**	**104.2**	**101.5**	**101.0**	**99.3**	**102.5**	**103.8**	**103.7**	**101.2**	**102.4**	**106.9**

*See Explanatory Note 18.

National Average



Coal

Cents per million Btu

Region	1974 DEC	1975 JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC
New England	93.5	113.0	134.8	126.9	135.4	125.7	116.5	119.2	127.3	120.4	128.7	127.6	120.8
Middle Atlantic	114.4	99.1	104.7	99.7	98.2	101.7	101.6	105.5	103.8	98.6	101.8	106.1	104.0
East North Central	92.2	80.0	78.4	79.3	80.4	82.0	82.4	82.3	84.3	83.4	82.1	83.8	85.7
West North Central	56.0	56.7	57.9	59.4	60.9	57.7	58.9	60.8	60.7	61.3	61.2	60.6	58.2
South Atlantic	125.8	102.3	97.0	97.4	100.8	98.8	98.4	101.6	101.4	102.4	98.6	98.5	100.1
East South Central	80.7	76.3	79.5	80.1	80.1	81.5	80.5	79.5	79.1	80.8	80.7	82.3	81.9
West South Central	21.0	21.0	21.0	21.0	21.0	21.0	21.0	24.0	24.0	24.0	24.0	24.0	24.0
Mountain	26.4	27.9	30.6	32.0	30.3	31.1	31.0	33.1	32.2	32.8	31.7	33.5	36.1
Pacific	38.5	38.4	57.7	57.2	56.8	57.0	58.4	58.2	58.8	58.9	58.4	59.5	58.9
NATIONAL AVG.	**88.9**	**80.9**	**81.7**	**80.6**	**80.5**	**81.8**	**81.4**	**80.8**	**82.1**	**82.1**	**81.5**	**81.7**	**82.2**

Residual Fuel Oil*

Cents per million Btu

Region	1974 DEC	1975 JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC
New England	207.5	202.5	204.1	204.3	202.9	200.1	201.7	196.3	192.6	187.9	184.1	184.8	181.0
Middle Atlantic	211.5	202.7	204.1	204.4	203.2	200.1	201.5	200.4	199.3	191.2	192.2	191.5	191.6
East North Central	164.6	144.9	165.0	163.4	183.1	157.0	168.3	185.2	191.7	205.9	189.7	211.4	192.4
West North Central	190.6	189.6	182.3	171.5	167.8	163.9	165.5	161.1	157.5	150.3	153.5	161.6	157.1
South Atlantic	182.2	180.9	181.6	186.8	188.9	187.7	189.3	185.4	183.8	181.5	180.7	179.8	173.0
East South Central	172.0	174.0	171.6	163.4	159.7	161.0	165.5	167.8	175.0	174.4	175.5	180.4	171.4
West South Central	171.7	177.1	178.2	175.8	191.5	177.7	182.0	186.2	185.2	174.4	168.4	189.2	187.9
Mountain	180.0	192.3	192.4	190.3	206.0	198.0	199.0	209.1	221.3	223.7	210.3	195.8	202.3
Pacific	233.0	223.6	235.0	241.1	261.1	260.6	245.6	253.8	258.1	257.9	255.5	261.9	259.7
NATIONAL AVG.	**202.1**	**197.7**	**202.0**	**204.8**	**209.3**	**205.6**	**200.0**	**198.9**	**200.8**	**200.5**	**197.0**	**200.5**	**198.1**

Natural Gas**

Cents per million Btu

Region	1974 DEC	1975 JAN	FEB	MAR	APR	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC
New England	NA	NA	NA	97.1	112.4	110.8	121.7	122.1	154.1	137.7	135.6	133.8	157.7
Middle Atlantic	64.3	86.1	84.5	82.4	101.7	98.3	92.7	91.2	87.6	87.6	90.5	103.1	105.0
East North Central	93.9	91.0	92.7	93.0	105.5	120.8	111.6	103.4	104.6	114.0	120.2	128.3	136.8
West North Central	42.3	43.6	43.8	51.5	54.5	58.6	58.1	59.2	56.9	57.8	55.4	55.8	55.9
South Atlantic	64.7	60.3	68.5	72.6	70.2	71.2	72.2	68.9	69.7	76.4	79.6	78.5	80.8
East South Central	87.8	76.2	79.5	82.2	82.7	76.4	77.0	91.0	95.9	110.3	105.5	120.2	146.6
West South Central	52.2	55.6	63.0	64.5	67.0	71.3	69.2	72.7	75.7	77.9	79.7	77.6	80.3
Mountain	70.7	66.9	66.7	63.7	67.4	68.1	69.6	71.8	71.1	78.6	82.0	86.2	90.4
Pacific	68.4	83.2	83.6	80.5	90.1	82.4	84.1	89.7	111.1	115.2	122.4	136.9	151.1
NATIONAL AVG.	**55.0**	**58.2**	**65.2**	**66.4**	**68.9**	**72.6**	**71.3**	**74.8**	**79.1**	**83.8**	**85.5**	**83.5**	**86.1**

NA=Not available.

*See Explanatory Note 18.

**Includes small quantities of coke oven gas, refinery gas, and blast furnace gas.

Source: Federal Power Commission.

Utility Fossil Fuels (Continued)

U.S. Average Delivered Prices of Coal at Utilities

		Contract	Spot
		In dollars per short ton	
1973	January	8.09	9.91
	February	8.31	10.01
	March	8.42	10.07
	April	8.43	10.44
	May	8.51	10.24
	June	8.62	10.43
	July	8.44	10.40
	August	8.45	10.44
	September	8.71	10.67
	October	8.86	11.24
	November	9.13	12.05
	December	9.19	13.34
1974	January	9.83	17.02
	February	10.40	20.57
	March	10.63	22.54
	April	11.28	23.70
	May	11.80	24.21
	June	11.87	25.84
	July	12.05	27.99
	August	12.50	28.87
	September	12.89	30.64
	October	13.30	30.67
	November	14.16	31.95
	December	14.20	31.05
1975	January	14.57	28.12
	February	15.71	25.93
	March	15.68	25.02
	April	15.88	24.52
	May	16.45	23.78
	June	16.40	23.36
	July	16.06	22.35
	August	16.65	22.39
	September	16.76	22.46
	October	16.72	22.52
	November	16.79	22.50
	December	16.90	22.40

Source: Federal Power Commission.

PETROLEUM CONSUMPTION

Petroleum consumption data for the first 2 months of 1976 are available for only a few nations. Consumption in France and the United States averaged 3.8 percent higher than in the first 2 months of 1975. January consumption in the United Kingdom, on the other hand, was 14.5 percent lower than the previous January; Italy showed no change from January 1975.

CRUDE OIL PRODUCTION

Average daily crude oil production in Arab OPEC countries increased 4.9 percent during February to 17.04 million barrels per day; non-Arab OPEC production increased by 4.4 percent. OPEC was the source of 65.8 percent of total free world production during the month.

Petroleum Consumption

Petroleum Consumption for Major Free World Industrialized Countries

		Total IEA*	Japan**	West Germany	France***	United Kingdom	Canada	Italy†	Other IEA††
		Thousands of barrels per day							
1973	Jan	35,700	4,121	2,868	2,743	2,315	1,667	1,781	4,281
	Feb	36,600	4,532	2,850	2,687	2,313	1,747	1,866	4,351
	Mar	34,100	4,450	2,707	2,528	2,271	1,584	1,710	4,185
	Apr	31,600	4,008	2,809	2,296	2,038	1,431	1,420	3,971
	May	31,500	3,822	2,546	1,890	1,939	1,486	1,285	3,819
	June	31,200	3,950	2,674	1,685	1,697	1,474	1,255	3,679
	July	30,100	3,783	2,196	1,566	1,637	1,490	1,303	3,355
	Aug	32,200	3,790	2,738	1,495	1,615	1,557	1,255	3,832
	Sept	31,500	3,813	2,618	1,932	1,727	1,427	1,462	3,833
	Oct	33,700	4,212	2,969	2,482	2,150	1,680	1,610	3,877
	Nov	35,400	4,562	2,883	2,593	2,258	1,801	1,551	3,853
	Dec	33,900	4,716	2,481	2,768	1,906	1,828	1,698	3,733
	AVG.	**33,104**	**4,144**	**2,693**	**2,219**	**1,974**	**1,597**	**1,525**	**3,863**
1974	Jan	33,700	4,273	2,556	2,523	2,045	1,823	1,755	3,978
	Feb	33,700	4,708	1,969	2,389	2,127	1,863	1,760	3,902
	Mar	31,600	4,508	2,173	2,249	2,133	1,658	1,579	3,504
	Apr	30,600	3,804	2,539	1,970	1,899	1,560	1,421	3,458
	May	30,000	3,718	2,403	1,915	1,704	1,572	1,349	3,534
	June	30,100	3,710	2,414	2,103	1,545	1,455	1,314	3,486
	July	30,300	3,573	2,548	1,703	1,531	1,534	1,368	3,445
	Aug	30,600	3,787	2,476	1,506	1,513	1,463	1,287	3,528
	Sept	30,700	3,868	2,473	1,996	1,663	1,414	1,527	3,761
	Oct	32,800	3,843	2,613	2,045	2,049	1,680	1,569	4,021
	Nov	33,000	4,075	2,432	2,260	2,108	1,713	1,580	3,877
	Dec	34,300	4,401	2,261	2,492	1,983	1,831	1,753	4,074
	AVG.	**31,775**	**4,019**	**2,408**	**2,094**	**1,857**	**1,630**	**1,521**	**3,711**
1975	Jan	33,400	3,850	2,183	2,185	R1,981	1,691	1,770	3,942
	Feb	33,300	4,242	2,455	2,236	R1,906	1,870	1,743	4,000
	Mar	30,800	3,978	2,234	1,947	R1,731	1,558	1,528	3,455
	Apr	30,600	3,448	2,431	2,199	R1,826	1,592	1,500	3,762
	May	27,600	3,296	2,253	R1,635	R1,482	1,474	1,150	2,827
	June	28,700	3,325	2,106	1,638	R1,414	1,550	1,256	3,438
	July	28,700	3,437	2,319	1,485	R1,319	1,536	R1,200	3,182
	Aug	28,600	3,397	2,360	1,296	R1,203	1,445	R1,072	3,381
	Sept	29,500	R3,568	2,309	1,780	R1,500	1,475	R1,425	3,537
	Oct	30,300	R3,584	2,328	1,910	R1,691	1,544	R1,647	3,680
	Nov	30,800	R3,940	2,361	R2,069	1,702	1,543	R1,418	3,594
	Dec	NA	R4,510	R2,502	R2,645	1,850	1,855	R1,574	NA
	AVG.	**30,185** (11 months)	**R3,712**	**R2,319**	**1,916**	**1,631**	**1,593**	**R1,438**	**3,522** (11 months)
1976	Jan	NA	4,219	NA	2,100	1,694	NA	1,770	NA
	Feb	NA	NA	NA	2,541	NA	NA	NA	NA

Note: All recent figures are estimates. All figures for "Total" and "Other" IEA are revised.

*The 18 signatory nations of the International Energy Agency (IEA) are: Austria, Belgium, Canada, Denmark, Federal Republic of Germany, Ireland, Italy, Japan, Luxembourg, Netherlands, New Zealand, Norway, Spain, Sweden, Switzerland, Turkey, United Kingdom, and United States. Except for the United States, inland consumption excludes bunkers, refinery fuel, and losses.

**Excludes liquefied petroleum gases and condensates.

***Not a member of IEA.

†Principal products only.

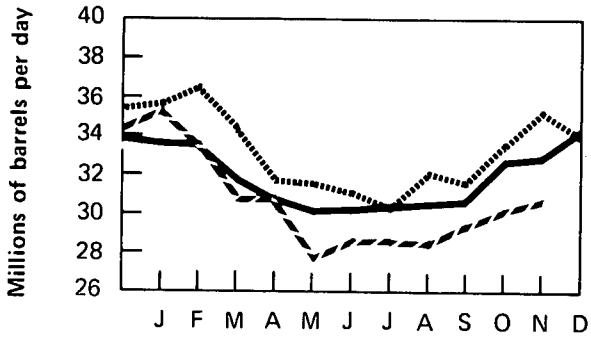
††Excludes the United States.

NA=Not available.

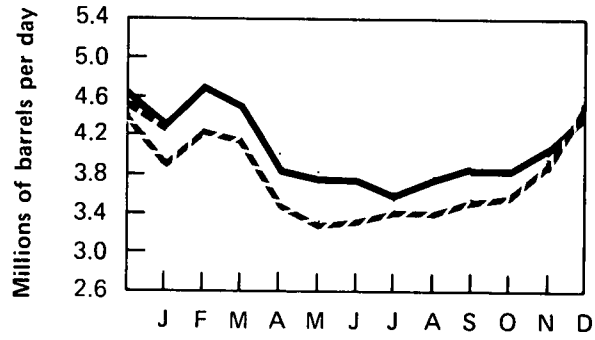
R=Revised data.

Source: Central Intelligence Agency.

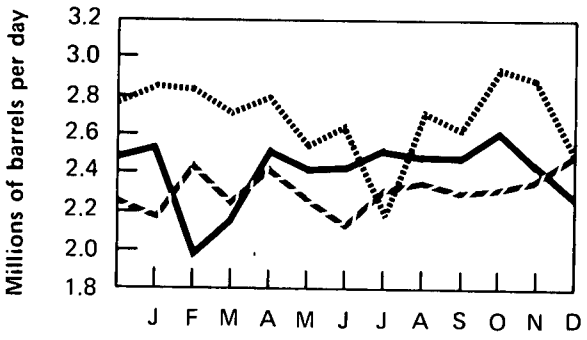
Total IEA



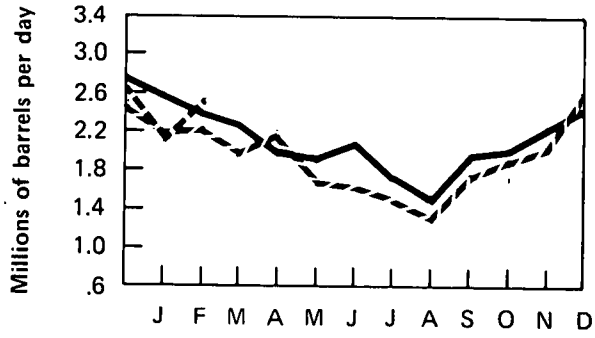
Japan*



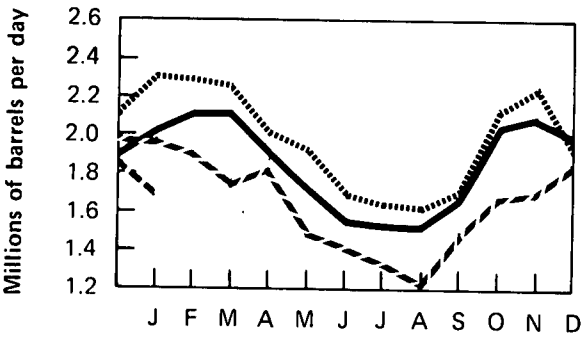
West Germany



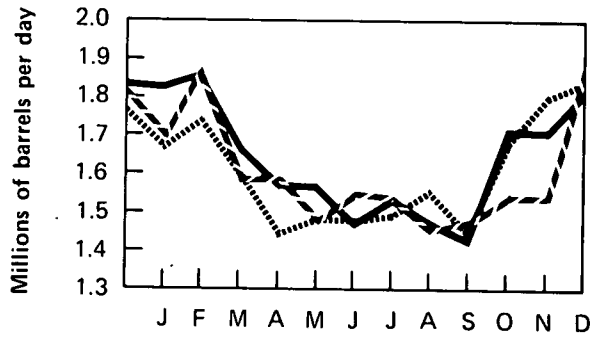
France**



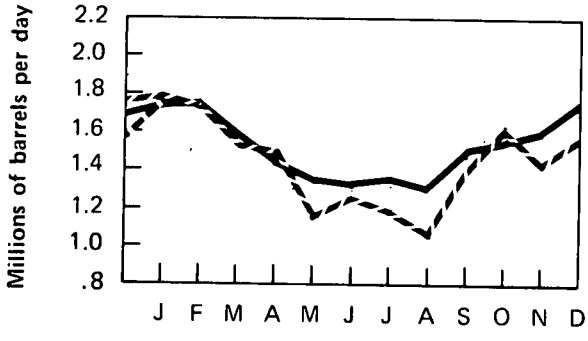
United Kingdom



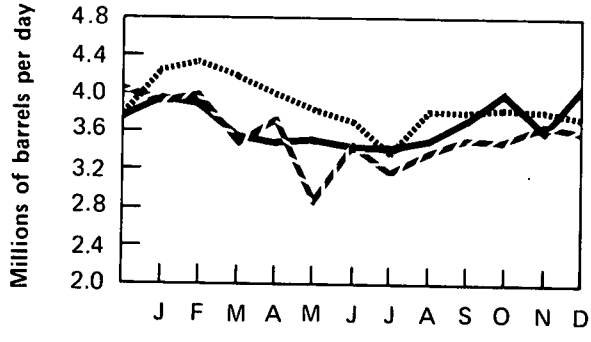
Canada



Italy***



Other IEA†



*Excludes liquefied petroleum gases and condensates.
**Not a member of IEA.
***Principal products only.
†Excludes the United States.

1973
1974
1975
1976

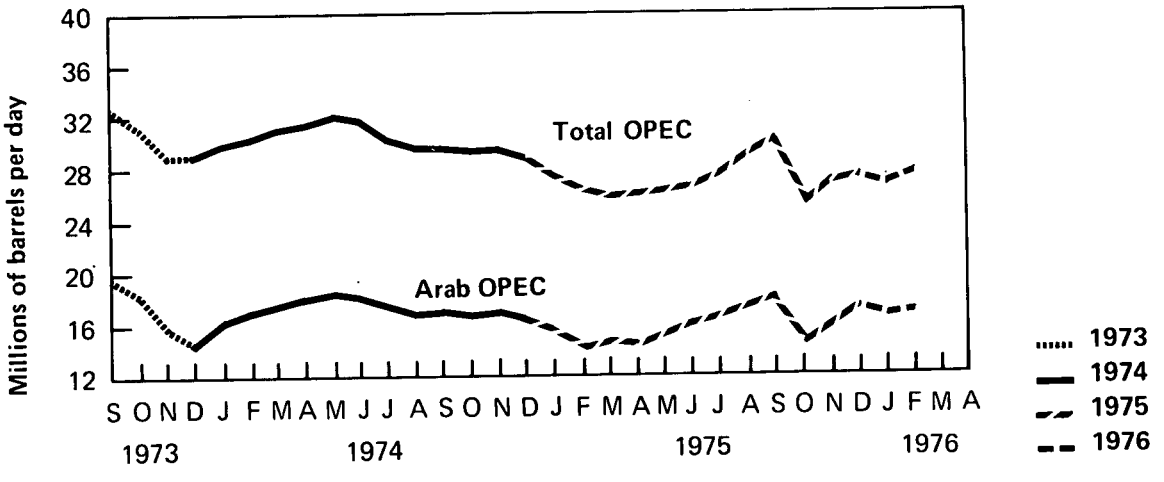
Crude Oil Production

Crude Oil Production for Major Petroleum Exporting Countries – February 1976

Country	Production				Production Capacity	Production Shut in
	1973	1974	1975	1976 February	February	February
	Thousands of barrels per day					Percent
Algeria	1,070	960	930	960	1,000	4.0
Iraq	2,015	1,975	2,250	2,010	3,000	33.0
Kuwait*	3,020	2,545	2,100	1,980	3,500	43.4
Libya	2,175	1,520	1,520	1,770	2,500	29.2
Qatar	570	520	440	470	700	32.9
Saudia Arabia*	7,600	8,480	7,080	7,940	11,500	31.0
United Arab Emirates	1,530	1,680	1,700	1,910	2,340	18.4
Subtotal: Arab OPEC	**17,980**	**17,680**	**16,020**	**17,040**	**24,540**	**30.6**
Ecuador	210	175	160	190	200	5.0
Gabon	150	200	220	210	250	16.0
Indonesia	1,340	1,375	1,310	1,460	1,700	14.1
Iran	5,860	6,020	5,350	5,020	6,500	22.8
Nigeria	2,055	2,255	1,790	2,070	2,500	17.2
Venezuela	3,365	2,975	2,350	2,000	2,900	31.0
Subtotal: Non-Arab OPEC	**12,980**	**13,000**	**11,180**	**10,950**	**14,050**	**22.1**
Total: OPEC	**30,960**	**30,680**	**27,200**	**27,990**	**38,590**	**27.5**
Canada	1,800	1,695	1,470	1,680	2,000	16.0
Mexico	465	580	720	830	850	2.4
Total: OPEC, Canada Mexico	**33,225**	**32,955**	**29,390**	**30,500**	**41,440**	**26.3**
Total World	**55,740**	**55,885**	**53,170**	****54,370**		

*Includes about one-half of Neutral Zone production which amounted to approximately 400,000 barrels per day in February.
**January figures were used for communist countries to compute world total for February.
Source: Central Intelligence Agency.

OPEC Countries Crude Oil Production



Definitions

Base Production Control Level

1. Prior to February 1, 1976: the total number of barrels of domestic crude oil produced and sold from a particular property in the same month of 1972. If domestic crude oil was not produced and sold from that property in every month of 1972, the total number of barrels of domestic crude oil produced and sold from that property in 1972, divided by 12.

2. Effective February 1, 1976: the total number of barrels of old crude oil produced and sold from the property during calendar year 1975, divided by 365, and multiplied by the number of days in the particular month during 1975. A producer may elect to use the total number of barrels of crude oil produced and sold from the property during calendar year 1972, divided by 366, and multiplied by the number of days in the particular month during 1972.

Branded Independent Marketer

A firm which is engaged in the marketing or distribution of refined petroleum products pursuant to (1) an agreement or contract with a refiner (or a firm which controls, is controlled by, or is under common control with such refiner) to use a trademark, trade name, service mark, or other identifying symbol or name owned by such refiner (or any such firm), or (2) an agreement or contract under which any such firm engaged in the marketing or distribution of refined petroleum products is granted authority to occupy premises owned, leased, or in any way controlled by a refiner (or firm which controls, is controlled by, or is under common control with such refiner), but which is not affiliated with, controlled by, or under common control with any refiner (other than by means of a supply contract, or an agreement or contract described in parts (1) or (2) of this definition), and which does not control such refiner.

Ceiling Price

The maximum permissible selling price, prior to February 1, 1976, for a particular grade of domestic crude oil in a particular field is the May 15, 1973, posted price plus $1.35 per barrel.

Controlled Crude Oil

Crude oil that was domestically produced prior to February 1, 1976, subject to the ceiling price for crude oil. For a particular property which is not a stripper well lease, the volume of controlled oil equals the base production control level minus an amount of released oil equal to the new oil production from that property.

Crude Oil Domestic Production

The volume of crude oil flowing out of the ground. Domestic production is measured at the wellhead and includes lease condensate, which is a natural gas liquid recovered from lease separators or field facilities.

Crude Oil Imports

The monthly volume of crude oil imported which is reported by receiving refineries, including crude oil entering the U.S. through pipelines from Canada.

Crude Oil Input to Refineries

Total crude oil used as input for the refining process, less crude oil lost or used for refinery fuel.

Crude Oil Stocks

Stocks held at refineries and at pipeline terminals. Does not include stocks held on leases (storage facilities adjacent to the wells), which historically total approximately 13 million barrels.

Cumulative Deficiency

A measure of the cumulative deficit of production below the base production control level after the first month in which new oil was produced and sold from a specific property.

Dealer Tankwagon (DTW) Price

The price at which a retail dealer purchases gasoline from a distributor or a jobber.

Distillate Fuel Oil

The lighter fuel oils distilled off during the refining process. Included are products known as ASTM grades Nos. 1 and 2 heating oils, diesel fuels, and No. 4 fuel oil. The major uses of distillate fuel oils include heating, fuel for on- and off-highway diesel engines, and railroad diesel fuel. Minor quantities of distillate fuel oils produced and/or held as stocks at natural gas processing plants are not included in this series.

Domestic Demand for Refined Petroleum Products

A calculated value, computed as domestic production plus net imports (imports less exports), less the net increase in primary stocks. It, therefore, represents the total disappearance of refined products from primary supplies.

Electricity Production

Production at electric utilities only. Does not include industrial electricity generation.

Entitlement Position

The monthly entitlement position of a refiner indicates whether he bought or sold entitlements in that month. An entitlement is the right to process "deemed old oil," which is the sum of a refiner's receipts of "old" oil and a fraction of his receipts of "upper tier" crude oil. This fraction is set monthly by FEA. A refiner must purchase entitlements for the amount of his "deemed old oil" receipts in excess of the national domestic crude oil supply ratio (NDCOSR). The NDCOSR, as calculated by FEA, reflects the differences in costs to refiners of "old" oil, "upper tier" crude oil, and imported crude oil.

Entitlement Price

The price of an entitlement, fixed by FEA, is the exact differential as reported for the month between the weighted average cost per barrel to refiners of "old" oil and of imported crude oil, less 21 cents, such cost to be equivalent to the delivered cost to the refinery.

Firm Natural Gas Service

High priority gas service in which the pipeline company is under contract to deliver a specified volume of gas to the customer on a non-interruptible basis. Residential and small commercial facilities usually fall into this category.

Interruptible Natural Gas Service

Low priority gas service in which the pipeline company has the contractual option to temporarily terminate deliveries to customers by reason of claim of firm service customers or higher priority users. Large commercial facilities, industrial users, and electric utilities usually fall into this category.

Jet Fuel

Includes both naphtha-type and kerosine-type fuels meeting standards for use in aircraft turbine engines. Although most jet fuel is used in aircraft, some is used for other purposes, such as for generating electricity in gas turbines.

Jobber

A petroleum distributor who purchases refined product from a refiner or terminal operator for the purpose of reselling to retail outlets and commercial accounts or for the purpose of retailing through his own retail outlets.

Jobber Margin

The difference between the price at which a jobber purchases refined product from a refiner or terminal operator and the price at which the jobber sells to retail outlets. This does not reflect margins obtained by jobbers through retail sales or commercial accounts.

Jobber Price

The price at which a petroleum jobber purchases refined product from a refiner or terminal operator.

Landed Cost

The cost of imported crude oil equal to actual cost of crude at point or origin plus transportation cost to the United States.

Limited Work Authorization

A Limited Work Authorization (LWA) may be granted by the Atomic Safety and Licensing Board of the Nuclear Regulatory Commission to an applicant who wants to construct a nuclear powerplant providing that the project has been cleared for all requirements of the National Environmental Protection Act and that the geologic and topographic suitability of the reactor site has been found satisfactory. The LWA allows an applicant to proceed with site excavation, install temporary construction and service facilities, construct service roads, and erect structures and components not subject to normal quality assurance inspections. It may save a utility from 6 to 8 months in total construction time. However, because the ultimate approval of a construction permit is based on all evidence revealed during the licensing hearings, the successful award of an LWA is no guarantee that a construction permit will also be granted.

Line Miles of Seismic Exploration

The distance along the earth's surface that is covered by seismic traverses.

Lower Tier Crude Oil

Old crude oil.

Lower Tier Ceiling Price Determination

The lower tier ceiling price for a particular grade of domestic crude oil in a particular field is the sum of (1) the highest posted price at 6 a.m., local time, May 15, 1973, for transactions in that grade of crude oil in that field; or if there was no posted price in that field for that grade of domestic crude oil, the related price for that grade of domestic crude oil which is most similar in kind and quality in the nearest field for which prices were posted; and (2) $1.35 per barrel.

Major Brand

Lundberg Survey, Inc., defines major brand as an integrated company that produces, refines, transports, and markets in Interstate Commerce under its own brand(s) in 20 or more States.

Motor Gasoline Production

Total production of motor gasoline by refineries, measured at refinery outlet. Relatively small quantities of motor gasoline are produced at natural gas processing plants, but these quantities are not included.

Motor Gasoline Stocks

Primary motor gasoline stocks held by gasoline producers. Stocks at natural gas processing plants are not included.

Natural Gas Liquids (NGL)

Products obtained from natural gasoline plants, cycling plants, and fractionators after processing the natural gas. Included are ethane, liquefied petroleum (LP) gases (propane, butane, and propane-butane mixtures), natural gasoline, plant condensate, and minor quantities of finished products such as gasoline, special naphthas, jet fuel, kerosine, and distillate fuel oil.

New Crude Oil

1. Prior to February 1, 1976: the total number of barrels of domestic crude oil produced and sold in a specific month, less the base production control for that month and less the current cumulative deficiency.

2. Effective February 1, 1976: the total number of barrels of domestic crude oil produced and sold in a specific month, less the property's base production control level for that month and less the current cumulative deficiency since February 1, 1976.

Nonbranded Independent Marketer

A firm which is engaged in the marketing or distribution of refined petroleum products, but which (1) is not a refiner, (2) is not a firm which controls, is controlled by, is under common control with, or is affiliated with a refiner (other than by means of a supply contract), and (3) is not a branded independent marketer.

Old Crude Oil

1. Prior to February 1, 1976: the total number of barrels of crude oil produced and sold from a property in a specific month, less the total number of barrels of new crude oil for that property in that month and less the total number of barrels of released crude oil for that property in that month.

2. Effective February 1, 1976: the total number of barrels of crude oil produced and sold from a property in a specific month, less the total number of barrels of new crude oil for that property in that month.

Power Ascension Nuclear Powerplant

A nuclear powerplant that has been licensed by the Nuclear Regulatory Commission to operate, but which is in the initial testing phase during which production of electricity may not be continuous. In general, when the electric utility is satisfied with the plant's performance, it formally accepts the plant from the manufacturer, and places it in "commercial operation" status. A request is then submitted to the appropriate utility rate commission to include the powerplant in the rate base calculation.

Primary Stocks of Refined Petroleum Products

Stocks held at refineries, bulk terminals, and pipelines. They do not include stocks held in secondary storage facilities, such as those held by jobbers, dealers, independent marketers, and consumers.

Property

Property means the right to produce domestic crude oil, which arises from a lease or from a fee interest.

Refined Petroleum Products Imports

Imports (into the 50 States and the District of Columbia) of motor gasoline, naphtha-type jet fuel, kerosine-type jet fuel, kerosine, distillate fuel oil, residual fuel oil, liquefied petroleum gases, petrochemical feedstocks, special naphtha, lubricants, waxes, asphalt, natural gas, plant condensate, and unfinished oils. Included are imports of fuels into bonded storage and receipts from U.S. territories.

Refiner Acquisition Cost

The cost to the refiner, including transportation and fees, of crude petroleum. The composite cost is the average of domestic and imported crude costs and represents the amount of crude cost which refiners may pass on to their customers.

Released Crude Oil

An amount of crude oil produced from a property in a particular month prior to February 1, 1976, which is equal to the total number of barrels of new crude oil produced and sold from that property in that month. The amount of released crude oil for a property in a particular month shall not exceed the base production control level for that property in that month.

Residual Fuel Oil

The heavier oils that remain after the distillate fuel oils and lighter hydrocarbons are boiled off in refinery operations. Included are products known as ASTM grades Nos. 5 and 6 oil, heavy diesel oil, Navy Special Oil,

Bunker C oil, and acid sludge and pitch used as refinery fuels. Residual fuel oil is used for the production of electric power, for heating, and for various industrial purposes.

Rotary Rig

Machine used for drilling wells that employs a rotating tube attached to a bit for boring holes through rock.

Separative Work Unit (SWU)

The measure of work required to produce enriched uranium from natural uranium. Enrichment plants separate natural uranium feed material into two groups, an enriched product group with a higher percentage of U-235 than the feed material and a depleted tails group with a lower percentage of U-235 than the feed material. To produce 1 kilogram of enriched uranium containing 2.8 percent U-235, and a depleted tails assay containing 0.3 percent U-235, it requires 6 kilograms of natural uranium feed and 3 kilograms of separative work units (3 SWU).

Stripper Well Lease

A property whose average daily production of crude oil (excluding condensate recovered in nonassociated production) per well did not exceed 10 barrels per day during any preceding calendar year beginning after December 31, 1972.

Synthetic Natural Gas (SNG)

A product resulting from the manufacture, conversion, or reforming of petroleum hydrocarbons which may be easily substituted for or interchanged with pipeline quality natural gas.

Uncontrolled Crude Oil

That portion of domestic crude oil production including new, released, and stripper oil which, before February 1, 1976, could be sold at a price exceeding the ceiling price.

Unrecouped Costs

Costs which have not been recovered in the current month's product prices but which have been "banked" for later use.

Upper Tier Crude Oil

New crude oil and crude oil produced from a stripper well lease.

Upper Tier Ceiling Price Determination

The upper tier ceiling price for a particular grade of domestic crude oil in a particular field is (1) the highest posted price on September 30, 1975, for transactions in that grade of crude oil in that field in September 1975, or if there was no posted price in that field for that grade of domestic crude oil, the related price for that grade of domestic crude oil which is most similar in kind and quality in the nearest field for which prices were posted; less (2) $1.32 per barrel.

Well

Hole drilled for the purpose of finding or producing crude oil or natural gas or providing services related to the production of crude oil or natural gas. Wells are classified as oil wells, gas wells, dry holes, stratigraphic tests, or service wells. This is a standard definition of the American Petroleum Institute.

Explanatory Notes

1. Domestic production of energy includes production of crude oil and lease condensate, natural gas (wet), and coal (anthracite, bituminous, and lignite), as well as electricity output from hydroelectric and nuclear powerplants and industrial hydroelectric power production. The volumetric data were converted to approximate heat contents (Btu-values) of the various energy sources using conversion factors listed in the Units of Measure.

2. U.S. imports of fossil fuels include imports of crude oil, refined petroleum products, and natural gas (dry).

3. Domestic consumption of energy includes domestic demand for refined petroleum products, consumption of coal (anthracite, bituminous, and lignite) and natural gas (dry), electricity output from hydroelectric and nuclear powerplants, industrial hydroelectric power production, and imports of electric power. Approximate heat contents (Btu-values) were derived using conversion factors listed in the Units of Measure. Electricity imports were converted using the Btu-content of hydroelectric power. 1975 electricity imports were estimated on the basis of imports levels during 1974.

4. Graphic presentations of petroleum volumetric data show Bureau of Mines (BOM) figures for 1973 through December 1975 and API figures for January 1976 forward. FEA monthly data for May 1974 through March 1975 were based on the *Weekly Petroleum Statistics Report* which presented volumetric data on domestic petroleum receipts and imports for all refiners and bulk terminal operators, as well as production and stock levels for each major petroleum product. In April 1975, the FEA weekly report was replaced by the *Monthly Petroleum Statistics Report* which presents essentially the same data on a monthly basis.

Conceptually, the major difference between FEA and BOM data occurs in the "Stocks" series. Stock levels reported by FEA for the major petroleum products are higher than those reported by BOM, because the FEA series includes stocks of independent terminal operators not counted by BOM. Beginning in December 1974, however, BOM data reflect the inclusion of approximately 100 additional bulk terminals in the coverage of primary stocks, bringing the data base for the 2 series into closer agreement.

In the current issue, cumulative 1973, 1974, and 1975 petroleum data presented in the text are based on BOM figures. Discussions of cumulative 1976 data are based on API figures.

5. Oil heating degree-days relate demand for distillate heating fuel to outdoor air temperature. Heating degree-days are defined as deviations of the mean daily temperature at a sampling station below a base temperature equal to 65° F by convention. Numerous studies have shown that when the outside temperature is 65°, most buildings can maintain an indoor air temperature of 70° without the use of heating fuels.

Mean daily temperature information is forwarded to the National Oceanic and Atmospheric Administration, Department of Commerce, from approximately 200 weather stations around the country. These data are used to calculate statewide heating degree-day averages based on population. The population-weighted State figures are aggregated into Petroleum Administration for Defense Districts and the national average, using a weighting scheme based on each State's consumption of distillate fuel oil per degree-day (1974 data base).

6. Domestic demand figures for natural gas liquids (NGL) as reported by BOM and reproduced in this publication do not include amounts utilized by refineries for blending purposes in the production of finished products, principally gasoline. Use of NGL at refineries is reported in a separate column. The production series cited in this publication shows both NGL produced at processing plants and liquefied gases produced at refineries. NGL produced at refineries is extracted from crude oil and hence, to avoid double counting, should not be included in calculations of total U.S. production of petroleum liquids. The NGL stock series shown in this volume includes liquids held as stocks at both natural gas processing plants and at refineries.

7. Domestic consumption of natural gas includes the quantities sold to consumers plus the gas used for plant and pipeline fuel, after the natural gas liquids have been extracted. All monthly consumption data are estimated.

Marketed production of natural gas includes gross withdrawals from the ground less the quantities used for repressuring and the amount vented and flared, before the natural gas liquids have been extracted.

8. The Federal Energy Administration and Federal Power Commission began the coordinated collection and compilation of monthly underground storage information from all underground storage operators in the United States in October 1975. Initial storage information reported was for the month of September 1975. Comparable monthly information for total U.S. storage operations is not available for prior periods.

The total gas in storage is the total volume of gas (base gas plus working gas) in storage reservoirs as of the end

of the month. Base gas is the volume of gas, including all native gas in place at the time of conversion to storage, needed as a permanent inventory to maintain adequate reservoir pressures and deliverability rates throughout the withdrawal season. Base gas includes the volumes which will not be recoverable upon termination of storage operations. Working gas is the volume of gas above the designated base gas level available for withdrawal.

9. Bituminous coal and lignite consumption are reported by the Bureau of Mines are derived from information provided by the Federal Power Commission, Department of Commerce, and reports from selected manufacturing industries and retailers. Domestic consumption data in this series, therefore, approximate actual consumption. This is in contrast to domestic demand reported for petroleum products, which is a calculated value representing total disapparance from primary supplies.

Bituminous coal and lignite production is calculated from the number of railroad cars loaded at mines, based on the assumption that approximately 60 percent of the coal produced is transported by rail. Production data are estimated by the Bureau of Mines from Association of American Railroads reports of carloadings.

10. Quantities of uranium are measured by various units at different stages in the fuel cycle. At the mill, quantities are usually expressed as pounds or short tons of U_3O_8. After the conversion stage, the units of measure are either metric tons (MT) of UF_6 or metric tons of uranium (MTU). The latter designation expresses only the elemental uranium content of UF_6.

Following the enrichment stage, the same units are used, but the U-235 content has been enhanced at the expense of loss of material. At the fabrication stage, UF_6 is changed to UO_2, and the standard unit of measure is the MTU. We have chosen to present all uranium quantities as MTU; conversion factors to other units are given in the section on Units of Measure.

11. The units used to describe power generation at nuclear plants are all based on the watt, which is a unit of power. (Power is energy produced per unit of time.) As with fossil-fueled plants, nuclear plants have three design power ratings. The thermal rating (expressed in thermal megawatts) is the rate of heat production by the reactor core. The gross electrical rating (expressed in electrical megawatts, MWe) is the generator capacity at the stated thermal rating of the plant. The net electrical rating (also expressed in MWe) is the power available as input to the electrical grid after subtracting the power needed to operate the plant. (A typical nuclear plant needs 5 percent of its generated electricity for its own operation.)

The electrical energy produced by a plant is expressed either as megawatt hours (MWhe) or kilowatt hours (KWhe). Tables in the nuclear section show generated electricity as average electrical power. This enables a more direct comparison to design capacity and to previous months' performances. To obtain the quantity of electricity generated during a given time period (in megawatt hours), multiply the average power level (in megawatts) by the number of hours during that period.

The energy extracted from uranium fuel is expressed as thermal megawatt days per metric ton of uranium (MWD/MTU). The production of plutonium in the fuel rods is expressed as kilograms of plutonium per metric ton of discharged uranium (kg/MTU).

12. The Residential and Commercial Sector consists of housing units, non-manufacturing business establishments (e.g., wholesale and retail businesses), health and educational institutions, and government office buildings. The Industrial Sector is made up of construction, manufacturing, agriculture, and mining establishments.

The Transportation Sector consists of both private and public passenger and freight transportation, as well as government transportation, including military operations. The Electric Utilities Sector is made up of privately- and publicly-owned establishments which generate electricity primarily for resale.

13. The petroleum short-term demand forecasting model uses historical data to construct a regression equation of demand for each of eight major petroleum products. Each equation attempts to capture the relationship between final demand for that product and the relevant factors influencing that demand. The explanatory factors used in predicting product demand include (a) macroeconomic variables such as disposable personal income and gross national product (GNP), (b) real product prices, (c) variables representing the effects of weather and other seasonal variations in demand, and (d) other factors relevant to a particular product.

The assumptions underlying the current short-term forecast are as follows:

(1) Normal weather;
(2) Real GNP growth rate of 8.4 percent for 1976;
(3) Implementation of the Energy Policy and Conservation Act. Specifically, the composite price of domestic crude oil is set at $7.66 per barrel beginning February 1976. This price ceiling is allowed to rise by 10 percent per year to account for inflation and other factors;

(4) Elimination of the $2.00-per-barrel crude import fee beginning January 1976; and
(5) OPEC maintains a constant real crude oil price from April 1976 through the end of the forecast interval.

14. Mileage estimates for 1975 are based on average number of miles traversed per crew day in 1974.

15. Prior to January 1975, diesel fuel prices were obtained from retail gasoline dealers that also sold diesel fuel. Beginning in January 1975, the diesel fuel survey was expanded to include selected truck stops plus additional retail gasoline dealers that sold diesel fuel. Consequently, diesel fuel prices for January 1975 forward are not exactly comparable to prior data. Selling price estimates are based on a survey of 31 cities. Margins are based on a survey of 10 cities.

16. The domestic crude petroleum wellhead price represents the first sale price for crude oil and lease condensates. The refiner acquisition cost of domestic crude petroleum is the price paid by refiners for domestic crude petroleum, unfinished oils, and natural gas liquids and includes transportation costs from the wellhead to the refinery.

17. The refiner acquisition cost of imported crude petroleum is the average landed cost of imported crude petroleum to the refiner and represents the amount which may be passed on to the consumer. It incorporates transportation costs and fees (including the supplemental import fees) and any other costs incurred in purchasing and shipping crude oil to the United States.

The estimated landed cost of imported crude petroleum from selected countries does not represent the total cost of all imported crude. Prior to March 1975, imported crude costs to U.S. company-owned refineries in the Caribbean were not included in the landed cost, and costs of crude petroleum from countries which export only small amounts to the United States were also excluded. Beginning in March 1975, however, coverage was expanded to include U.S. company-owned refineries in the Caribbean. Landed costs do not include supplemental fees.

18. The weighted average utility fuel cost for the total United States includes distillate fuel oil delivered to utilities whereas the regional breakdown for residual fuel oil prices represents only No. 6 fuel oil prices.

Units of Measure

Weight

1 metric ton	*contains*	1.102 short tons

Conversion Factors for Crude Oil

Average gravity

1 barrel (42 gallons)	*weighs*	0.136 metric tons (0.150 short tons)
1 metric ton	*contains*	7.33 barrels
1 short ton	*contains*	6.65 barrels

Conversion Factors for Uranium

1 short ton (U_3O_8)	*contains*	0.769 metric tons of uranium
1 short ton (UF_6)	*contains*	0.613 metric tons of uranium
1 metric ton (UF_6)	*contains*	0.676 metric tons of uranium

Approximate Heat Content of Various Fuels

Petroleum	
Crude Oil	5.800 million Btu/barrel
Refined products	
Imports, average	6.000 million Btu/barrel
Consumption, average	5.5061 million Btu/barrel
Gasoline	5.248 million Btu/barrel
Jet Fuel, average	5.592 million Btu/barrel
Naphtha-type	5.355 million Btu/barrel
Kerosine-type	5.670 million Btu/barrel
Distillate fuel oil	5.825 million Btu/barrel
Residual fuel oil	6.287 million Btu/barrel
Natural gas liquids	4.031 million Btu/barrel
Natural gas	
Wet	1,097 Btu/cubic foot
Dry	1,024 Btu/cubic foot
Coal	
Bituminous and lignite	
Production	23.73 million Btu/short ton
Consumption	23.07 million Btu/short ton
Anthracite	25.40 million Btu/short ton

Electricity Conversion Heat Rates

Fossil fuel steam-electric	
Coal	10,176 Btu/kilowatt hour
Gas	10,733 Btu/kilowatt hour
Oil	10,826 Btu/kilowatt hour
Nuclear steam-electric	10,660 Btu/kilowatt hour
Hydroelectric	10,389 Btu/kilowatt hour
Electricity Consumption	3,412 Btu/kilowatt hour

U.S. DEPARTMENT OF COMMERCE
National Technical Information Service
Springfield, Va. 22161

OFFICIAL BUSINESS
PRINTED MATTER

An Equal Opportunity Employer

POSTAGE AND FEES PAID
U.S. DEPARTMENT OF COMMERCE
COM-211

Federal Energy Administration
Monthly Energy Review

FEA/B-76/217